جـامعة اليرمـــوك
كلية الفنــون الجميلة
قسم الفنون التشكيلية

أدوبي اليستريتر كمقترح لتطوير المهارات الفنية لطلبة الصف العاشر الأساسي في الأردن

Adobe Illustrator as a Proposal to Develop the Artistic Skills to the Primary 10th grade Students in Jordan

اعداد
شادية يوسف هندي

اشراف الدكتور
منذر سامح العتوم

حقل التخصص - الفنون التشكيلية

2015م- 1436هـ

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بكالوريوس تصميم جرافيك، جامعة اليرموك، 1999م.

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في جامعة اليرموك، اربد، الأردن.

وافق عليها

الدكتور منذر سامح العتوم .... مشرفاً

أستاذ مساعد في التربية الفنية، جامعة اليرموك

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الأستاذ الدكتورة سلوى محمود حسن .... عضواً

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تاريخ مناقشة الرسالة 2015/1/4م

ب

إهداء

إلى من كان لي حباً وسنداً في هذه الدنيا

إلى روح الحبيب الغالي

أبي

الباحثة

أحمد الله تعالى على توفيقه لي في إتمام هذه الدراسة وبعد ...

أتقدم بجزيل الشكر والتقدير إلى أستاذي ومشرفي

الدكتور منذر سامح العتوم

الذي جاد علي بخبراته ووقته وجهده وتوجيهاته البناءة.

كما أتقدم بالشكر للجنة الإشراف الكريمة التي قدمت الدعم والتوجيه لإتمام هذه الدراسة

والتي تكونت من:

الأستاذ الدكتور وائل منير الرشدان

الأستاذة الدكتورة سلوى محمود حسن

والشكر والتقدير إلى جميع أساتذتي في كلية الفنون في جامعة اليرموك.

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2	ƗdžþǀdžƗ!ƒ
4	ƗƪƒƧþ!ƒ ƗǄƗƬdž
5	ƗƪƒƧþ!ƒ ƗŏdžǋǅƗ
6	ƗƪƒƧþ!ƒ ƻƒþǋǅ
6	ƗƪƒƧþ!ƒ ƯĂƧƼ
6	ƗƪƒƧþ!ƒ þĂþơ
7	ƗƪƒƧþ!ƒ ƘǴơǄƱƮdž
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9	ƗŏǉƼ!ƒ ƗŏƕƧƙ!ƒ
11	Ǵǌƻƒþǋ ǅ Ă ƗŏǉƼ!ƒ ƗŏƕƧƙ!ƒ ƗŏdžǋǅƗ
14	(ƧƬǴƶ!ƒ ƻ Ʈ!ƒ ƗƕǄƱ) ƧƬƵ ƗƪþǴƪ!ƒ Ǉƪ Ŏƻ Ǉƻ!ƒ ƗŏƞĂ!ĂƗŏƪ
16	ɣĂƪǴơ!ƒĂ ƗŏƕƧƙ!ƒ
20	ɣĂƪǴơ!ƒĂ ƗŏǉƼ!ƒ ƗŏƕƧƙ!ƒ
22	ǄŏǄƶƙ!ƒ Ĭ!ǫ ɣĂƪǴơ!ƒ ýǴƤþǫ Ŏƻ ƗŏƕƧƶ!ƒĂ ƗŏdžǴƶ!ƒ ɣƧǴƞƙ!ƒ

[illegible]

[illegible]	[illegible]	[illegible]
62	[illegible]	1
65	[illegible] (Adobe Illustrator) [illegible]	2
68	[illegible] (One Sample T.test) [illegible]	3
70	[illegible] (Paired Samples Test) [illegible] (Adobe Illustrator) [illegible]	4

[illegible]

[illegible]	[illegible]	[illegible]
72	[illegible] (Adobe Illustrator)	1

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83 84 85	LJdž ưkkĂ Ɨʅ ƒƧϸ!ƒ ƖƒϸD .Ŏ!Ǔƒ Ɣʅ Ǵơ!ƒ ƴdž Ɨƕ!ǴƱ!ƒ ýdžǴʑk ăĂkʅ dž! Ŏǁƥ DžŏŏƖk ƗpǴƱƕ ƨkŏƨkʅ ŏ!ƒ ŎƕĂϸD ȠdžǴǈƧƕ Ŏ5 Ɨƕ!ǴƱ!ƒ ǅƒϸǕ ĭϸʑƕ DžŏŏƖk ƗpǴƱƕ (Adobe Illustrator)	1
89-87	Ŏ!Ǵk!ƒ Ăơǈ!ƒ ǏǁƵ ƩĂƧϸ!ƒ LJdž ϸϸʑ! ƗƱƤ .ǈǨŏ5ǈk ƘƒĂƱƤĂ ÜƗŏʅϸǋ!ƒ ýǴ‡TǕƒ Džʅ Ƨ :ýĂǕƒ ƩƧϸ!ƒ	2
91-90	.ǈǨŏ5ǈk ƘƒĂƱƤĂ ÜǴǌ5ŏƯĂkĂ ƖƨNJǴȠ!ƒ ƜǨǴdžǈ!ƒ ƜƒƧƤkʅ ƒ :ŎǈǴƛ!ƒ ƩƧϸ!ƒ	
94-92	.ǈǨŏ5ǈk ƘƒĂƱƤĂ ÜƘǴŏƧNJƨ!ƒĂ ϸĂƧĂ!ƒ ýŏ‡Tk : Ɨ !Ǵƛ!ƒ ƩƧϸ!ƒ	
96-95	.ǈǨŏ5ǈk ƘƒĂƱƤĂ ÜƘƒƧǴƱǗƒĂ ƻƧǴƤƨ!ƒ Džŏdž Ʈk :ƴƕƒƧ!ƒ ƩƧϸ!ƒ	
99-97	.ǈǨŏ5ǈk ƘƒĂƱƤĂ ÜŎ5ƒƧkơǗƒ Džʅ Ƨ!ƒĂ Ƨơ!ƒ Džʅ Ƨ!ƒ : ƩdžǴƤ!ƒ ƩƧϸ!ƒ	
103-101	(Adobe Illustrator) ƨkŏƨkʅ ŏ!ƒ ŎƕĂϸD ȠdžǴǈƧƕ Ɨʅ ƧǴdždžƕ LJǌdžǴŏp ǅǴǈƛD ƘǴƕ!ǴƱ!ƒ	3
121-105	ȠdžǴǈƧƕ DžƒϸƤkʅ Ǵƕ Ɣ Ăʅ Ǵơ!Ǵƕ Džʅ Ƨ!ƒ ƖϸơĂ Ʃ ŏƧϸk ýǚƤ LJdž ƖǨ5ǈdž ýǴdžƵǕ ƜǨǴdžǈ (Adobe Illustrator) ƨkŏƨkʅ ŏ!ƒ ŎƕĂϸD	4
130-123	ƨkŏƨkʅ ŏ!ƒ ŎƕĂϸD ȠdžǴǈƧƕ DžǌdžƒϸƤkʅ ƒ ýǚƤ LJdž LJŏǈǴǈ5!ƒ ýǴdžƵǕ ƜǨǴdžǈ	5

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[illegible] (2015) [illegible]

[illegible]

[illegible] (Adobe Illustrator) [illegible]

[illegible] (Adobe Illustrator) [illegible]

[illegible] (2015-2104) [illegible]

[illegible] (26) [illegible]

[illegible] (Adobe Illustrator) [illegible]

[illegible] (28) [illegible] (8) [illegible]

[illegible]

[illegible] (Adobe Illustrator) [illegible]

[illegible] (Adobe Illustrator) [illegible]

[illegible] (Adobe Illustrator) [illegible]

[illegible] (Adobe Illustrator) [illegible]

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[illegible]

[illegible]

[illegible]

[illegible] (23 :1970 [illegible]) [illegible]

[illegible]

[illegible] .(82 :1972 [illegible])

[illegible]

[illegible]

[illegible] (2006 [illegible]

[illegible] (Adobe Illustrator) [illegible]

(Adobe [illegible] Illustrator) [illegible]

[illegible] (Photoshop) [illegible] (Paint) [illegible]

[illegible] (Adobe Illustrator) [illegible]

.(Adobe Photoshop)

.(Adobe Illustrator)

(Paint)

(Adobe (Corel Draw) (Power Point)

Photoshop)

(Adobe Illustrator)

(Paint)

(Corel Draw)

(Adobe (Adobe Photoshop)

.Photoshop)

[illegible]

[illegible] (Adobe Illustrator)

[illegible]

[illegible]

-1 [illegible] (Adobe Illustrator)

-2 [illegible] (0,05 = a) [illegible]

[illegible] (Adobe Illustrator)

[illegible]

[illegible] (Adobe Illustrator) [illegible]

[illegible]:

- [illegible] (Adobe Illustrator) [illegible]
[illegible].
- [illegible].

[illegible]:

- [illegible] (Adobe Illustrator) [illegible]
[illegible]
- [illegible] (Adobe Illustrator) [illegible]
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[illegible]:

1- [illegible].

2- [illegible].

3- [illegible] ([illegible]2014 [illegible] [illegible]2015).

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- ǑƕĂƥǋ Ƚǂ ƧƬ ǴǌƙƧƥ ƮǋǑƙ!ƒ Ɲǆƒ Ƨƕ!ƒ ƥơǋ :(Adobe Illustrator) ƥłĭƥł ƨ ĩǁ ǏǴǋǊǈǄ -
ƘǴǆǍĂƪƧ!ƒ ƳĂǈ ǇǆǍ ƘǴǆǍǑǆƮƙ!ƒ ƥƒƥƵƹĂ ǇƪƧ!ƒ Ǒ5 ƒ ƮƤƙǆ Ɲǆ ǴǈƧƕ ĂǊǈĂ Ü(Adobe)
) ƪƥǀƶǆ!ƒ ƴǒƮǴ5ƙ!ƒ ǇƪƧ Ǒ5 ȴǒ!Ǵƶ!ƒ Ƚƥƥ!ƒĂ ǊǈƒĂ!ǋ ƟĂưĂƕ ƨ ǑǆƙǑ Ü(Vectors) ȴǌƞƙǆ!ƒ
.(2014 ÜƘǈƥǑƒƧƙ

- Ü(Adobe) ǑƕĂƥǋ Ƚǂ ƧƬ Ɲǆƒ Ƨƕ ƥơǋ :(Adobe Photoshop) ƒǊƪǊȴǊƺ ǏǴǋǊǈǄ -
ƴǒƥƶƙ ǏǁƵ ȴǒ!Ǵƶ!ƒ ƪƧƥǀ!Ǵƕ ƨ ǑǆƙǑ ł ǒơ ÜƧĂƮ!ƒ ƴǒƥƶƙĂ ǇǑǆƮƙ!ƒ Ǒ5 ǇƥƤƙƪǑ ł ǒơ
.(The free Dictionary, 2014)ƧĂƮ!ƒ

- ƨ ǑǆƙǑ ł ǒơ ÜƪƧƮǴƶǆ!ƒ ǇĂǈ5!ƒ ƳƒĂǈǋ ǇǆǍ ƳĂǈ ĂǊ :(Digital Art) ǏǅƽƥǁƸ ǅƵǁƸ -
ƪƨ ǑǆǆǍ ȴǒǈ5 ƴǴǆƵǋ ǇǑǆƮƙ! ȴ5ǁƙƤǆ ƭƧƱƕĂ ƴƪƒĂ ƴǂƬƕ ƔĂƪǴơ!ƒ ǴǒƞĂ!ĂǈǂƙǇƒƥƤƙƪǴƕ
.(The free Dictionary, 2014)

- ɯǴƙǈǕ ƔĂƪǴơ!ƒ ǴǒƞĂ!ĂǈǂƙǇƒƥƤƙƪƒ ƭǒƧƱ ǇƵ ǇƪƧ!ƒ ĂǊ : ƒǊƨ ƑƟǁ !ƸơǬȴ ƨ Ƒ Ǵ !ƨ ƥǁƸ -
ƴǆ ƧĂƮ!ƒ ƴǒƥƶƙ Ɲǆƒ Ƨƕ ǇƒƥƤƙƪƒ ƔĂƪǴơ!Ǵƕ ǇǑǆǴƪƧ!ƒ Ɲǆƥǒ ł ǒơ Üƪƨ Ǒǆǆǆ ȴǒǈ5 ƴǴǆƵƒ
.(Brower, 2014) ȴǒ!ǴƵ ƪƥĂƞ ƘƒƦ ƝƑǴƙǈ Ǐ!ƹ ƴĂƮĂǁ! ǇǑǆƮƙ!ƒĂ ǇƪƧ!ƒ Ɲǆƒ Ƨƕ

[illegible]

[illegible]

[illegible]:

[illegible]

[illegible]

[illegible]

[illegible]

[illegible]

[illegible] (25 :1999 [illegible]) [illegible]

.(7 :2002 [illegible]) [illegible]

[illegible]

[illegible]

[illegible]

[illegible]

[illegible] " (18 :1985 [illegible]) " [illegible]

[illegible]

[illegible] .(35 :2010 [illegible]) " [illegible]

[illegible]

.(163 :1985)

:1965

(51

.(2 :2001

[illegible]

[illegible] .(2009 [illegible])

[illegible]

.(7 :2002

[illegible] (17 :2001 [illegible]) [illegible]

.(41 :2010

[illegible] (1965) [illegible]

- [illegible] .(109 :1965 [illegible])
- [illegible] .(303 :1965 [illegible])
- [illegible] .(327 :1965 [illegible])
- [illegible] .(660 :1965 [illegible])
- [illegible] :1965 [illegible] .(664
- [illegible] .(666 :1965 [illegible])

- ƗpĜƱ ƹŏƧƷƙ ƚŏƧƱ ǛƵ ƱĜƺơǕƒ Ǐ ƵƔ ƔƷƙŏĂ ĈƒƥƶƒĂ ƧƙĂƙ!ƒ ǛƊ ƻƸƤŏ ƥŏƸƊ ŎƞǖƵ ƱĜƬǉ

ƥƧƸ!ƒ Ŏ5 ǕǉǗƙǉǊ ýĜƊƵƉ Ɨŏ ư ƧƊ ƗǘŏƊƞ (ƗǉŏƼ Ü ƩÜ 1965: 674).

- ƗǘŏƊƞ!ƒ ĈĜŏƬǗĜƺ ƱĜƺƙƧǕƒ ǉƥĜƵ ǛŏĂƚƙ! ƥƒƧƼǕƒ ǋŏƞĂƙ ýǖƤ ǛƊ Ɨŏ!ĜƵ ƗƶŏƼƧ ƚƒĂǨ ƗŏƊǉƙ

(ƗǉŏƼ Ü ƩÜ 1965: 676).

- ƧŏƧơƙ ƥƧƸ!ƒ ǛƊ ƗǉĂƬƤ ƥĂƞĂ!ƒ ƥĜƶ!ƒ ǐ ǋƙƒƥŏƥơƙĂ (ƗǉŏƼ Ü ƩÜ 1965: 679).

ǛǊ ǕǋĜƊƙǋǕƒ ǉƧƺ ĂƊĜƊ ƘƊ ƔƧƙĜƱǕƒ ƒƊƸ ǔĜƙŏĜƵƧĂ ƧĂƱƙŏ ƊƵ ƧĂƱƙ ƊƊ ǕĂǌƸƊ ǛƸ!ƒ ƬƙŏƗǕƒ ǋƞĂƺ

ǍŏƸǐĂ ǕĜǋƙ ƗƊƊƙƤƒ ǉƧĂƧư ǏǊ ƗŏƺƧƙ!ƒ Ŏ5 ǛŏĂƋǉƊ!ƒ ĂƵƥŏ ƊƊƊ Ü ƒ ĜƤ ǋƞĂƺ ýƷƱ!ƒ ǛƷĂ ÜƊĜƵ

Ŏ5 ƗƷƙƤƊ!ƒ ƗŏǉƷ!ƒ ƩƧƒƥƊ!ƒ ƊĂǌƸƊ ƧĂƱƙĂ ÜýƷƱ!ƒ ǛƷ ýĂơ ƊĂǌƸƊ!ƒ ƧĂƱƙ ƔƊ ǏƬĜƊƙƙ ƗƺǉĜǉƊ

ƗƛŏƥơƵ ǍŏƸǉǕƒĂ ýƑĜǉĂ!ƒ ƔŏƊƞ ƊƒƥƤƙǉƒ ŎƵƥƙǉŏ ƒǨǋĂ Ü(ǉƺǉĂŏǋŎÜ 1972: 242) Ɨ ŏƥơ!ƒ ƧƬƶ!ƒ

Ŏƙ!ƒĂ ÜǋŏƸ ǉƧƸĂƙƊ!ƒ ƊǉƧ!ƒ ǋƊƒƧƺ ýǖƤ ǛƊ ƔĂǉĜơ!Ĝƺ ƗƊƛƊƙƊ!ƒ ĜŏƞĂ!Ăǉƚƙ!ƒ ƊƒƥƤƙǉƒ ĜǋǉƊĂ ƗơĜƙƊ!ƒ

.ýƷƱ!ƒ ăƥ! Ɨŏǉƻ!ƒ ƘƒƧĜǋƊ!ƒ ƧŏĂƱƙ Ǐ ƵƔ ýƊƶƙ

:(ƥǉƒƒƊ ƹ Ƭƒ ƺĜƚư) ƥǉƔ ƺƨƣƒƨƒ Ɗƨ Ǐƹ ƊƵƒ ƒǕǋǋǉǐƨ

ƗǉǋƒƧƊ!ƒ :ŎǋĂ ýơƒƧƊ Ɨ ǖƛ Ǐ ǉ ƊǉƙĂ ÜĜƺŏƧƙ Ɨǉǉ 18 -12 ǛƊ ƗǉǋƒƧƊ!ƒ ƗƔơƧƊ ƊƥƺƙƔ

Ŏ5 ƧƬĜƶ!ƒ ƻ Ƭ!ƒ ƔǖƱ ƧƺƙƶŏĂ .(ƷĂƺ!ƒ ƗƔơƧƊ) ǉƧƤƙƊ!ƒ ƗǉǋƒƧƊ!ƒ ÜǏƱǉĂ!ƒ ƗǉǋƒƧƊ!ƒ ÜǉƧƚƺƊ!ƒ

ƗƔơƧƊ!ƒ ǉƧŏƤǕƒ ǛƊ ƒǨǋ ƙƬƙ!ƒ ƻŏǉ (ƒ!ƬǉƧƒǉÜ 1998: 23Ý ƥŏǉǋ!ƒ ǐÜ 2009: 63).

ǛƚƙƊƙ!ƒ ƒǨƷ5 ÜǋƙƒǨƺ ƩĜǉơǕƒ ǛŏĂƚƙ! ƥƧƸ!ƒ ƟĜƷƚ ƗƔơƧƊ!ƒ ǉǨǋ Ŏ5 ǉƥƒĜǉ!ƒ ƧǋĜƱƊ!ƒ ǛƊĂ

ǛĂƊƥƤǕƒ ǉĜƊǉ ĜƊ ƒǨǋĂ ÜǋƙŏƙƒǨ ư ƧƙƷƙ (ƥƧƸ!ƒ ĂƊǉ) ǉƧƚ5 ǛǕ ÜƗŏƺƧƙ ƥƞĂƙ ǛǕ5 ƗŏƥƧ5 ƗŏƙƒǨ ƔĜǉǋ

[illegible] (1965: 742-747).

[illegible] .(244 :2007 [illegible])

[illegible] (1970) [illegible] (79 :1970 [illegible]) [illegible] (Visual Realism Stage) [illegible] (35 :1978 [illegible]) [illegible] .(141 :2000 [illegible] 66 :2009 [illegible])

[illegible] .(244 :2007 [illegible]) [illegible]

[illegible] .(10 :2002 [illegible])

: [illegible]

[illegible] .(2 :2005 [illegible])

[illegible]

[illegible] 2003: 301-308).

[illegible] (Classroms of Tomorrow) Apple [illegible]

[illegible] (Mitchell & Hunt, 1997) [illegible] (Mohnsen, 1995) [illegible] %50 [illegible]

[illegible] (2001: 7).

[illegible] 2005: 18) [illegible]

[illegible] (108 :1997 [illegible]) [illegible]
.(215-214 :2000

[illegible]
.(155 [illegible] 139 :2007 [illegible])

[illegible]

ǸǃǴǷƥǫ ƨǴƽ ƥƿǍ ÜǴǌǩƒƨƥƿǍ ǴǌƮƑǴƮƤ Ǐǁǅ ƘǴǇǒƪơǩ!ƒ ýǴƤƥǫ ƨƒƨǆǩƪƒ Ǐ!ǫ ǂ5ǴưǫÜǂ5ǁǂǩ!ƒ ƨǴƶƪƊ

ýǴƞǆ Ŏ5 ǂƛ!Ǵƛ ƖƨǍƛ ƔǍƪǴơ!ƒ ƥƶǒǍ ÜǅǒǁƶǩǃǍ ǂǒƞƨǩ!ƒ ǇǍƋƬƞ ǇǒǁǅǴƶ!ƒǍ ǇǒƞƨǆǃƒǅǴǆǩǋǫ ǅǒǁƶǩ!ƒ Ŏ5

ƘǴƞǩǂǆ!ƒ ýǆƷ Ŏ5 ƘǁƛǆǩǂǒǇǴƛ!ƒǍ ÜƔǩǂ!ƒ ǂƷǴƞƱ Ŏ5 Ï!ǍǕƒ ƘǁƛǆǩǂǒơÜǅǒǁƶǩ!ƒ

.(41 :2003 ÜĭǍǴƱƨƪ!ƒ ÝƖƥǴƶƪ)

ŎǇǒǩǆơ ǴǋǆƨǂƦ Ǵǆǂ ǂǒǆǒǁƶǩ!ƒ ǂǁǆƶ!ƒ Ŏ5 ƔǍƪǴơ!ƒ ǴǌƞƶǁǒŎǩ!ƒ ƨƒǍƥǕƒ ǅǒƪƖǩ ǇǂǆǒǇ

-:ŎǋǂǒƪǒƒƨƨƒǍƥƊǂƛǘƛ Ï!ǫ Ü(2002)

- ƔǍƪǴơ!ƒ ƻƥǌǂ -:ŎǆǒǁƶǩƻƨƶǒǴǆǇǍǂǩ!ǂǒǆǒǁƶǩƖƥǴǆǂǸƪǒƨƥǩĭƊ ǂǒǞƪǴơ!ƒǂ5ǴƖƛ!Ǵƞ

.ǂǒ!Ǵơ!ƒƘƒƨǍƱǩ!ƒǂƞǂƒǍǆ!

- ǅǒǁƶǩ!ƒƖƨƒƥƞ -:ƔǍƪǴơ!ƒýǆƶƪǒ ƔǍƪǴơ!ƒ ǴǇǴ ƖƥƋǂ ǴǌǆƥƤǩƪǒ ƔǃƱ!ƒ Ŏ5 ǅƒƨƞǫ ƯƶƞǴ

ǂǁǃƱ!ƒ Ƙǘƞƪ Ʊ5ơǒ Ǵǆǂ ÜǂǒƪƨƥǆƬ!ƒ ƘǴƞƞƒƛ!ƒǍ ǂǴơƞÜƒ ǂƶǴƞƱ ǍƊ ÜǂǒƞǴƪơ!ƒ ƘǴǁǆƶ!ƒ

.ǂǒƨƒƥÜƒ ƘǴǁǆƶ!ƒ Ǉǆ ǁ!ǂ ƨǒƹǍ ÜǅǋǴǆǘǶǍ

- ƔǍƪǴơ!ƒ ƖƥƶƪǴƞ ǅǒǁƶǩ!ƒ -:ƔǍƪǴơ!ƒ ǅǍƊ Ŏ5 ǇǒǆǒǒǆǍ ǂǆǒǇǆǴǞ ǅǒǁƶǩǆ!ƒ ǅǍƊǍ ƔǍƪǴơ!ƒ

ǸǍƪǒƨƥǞ ǇǴǆ!ƒ ƝǍǇǍ ƘƒƥǴǆǇ ǂǁǞƤǆ ǂ!ǴƶǍǆ ǅƨǴǆǂ ǂǒǆǒǁƶǩ!ƒ ƖǴǆǂ ǅǒƘǴǆ!ƒǍƻ ǅǒǁƶǩ!ƒ Ǒ

.(2 :2002 ÜŎǇǒǩǆơ) ǂǁǃƱ!ƒ ƒ ƑǴƮƤǍ

ǁ ǴǇǋ ǇƊ ƨǍƹ ÜǅǒǁƶǩƑƒ ýǴƞǆ Ŏ5 ƔǍƪǴơ!ƒ ǅƒƥƤƪǩ ǴǌǆƥƖǒ Ŏǩ!ƒ Ƙƒ ǇǆǅǆǍ ǇǆǂǍ ǅƹƨ!ǴǍ

ǅǋǆƊ ǇǆǍ ÜŎǋƨƶ!ƒǍ ŎǆǂǴƶ!ƒ ăǍƪǆ!ƒ Ǐǁǅ ƔǍƸǆ!ƒ ýǂƬ!ǴǍ ǇǒƨǴƬǩǃƒ Ǉǆ ƥơǩ ǂǴƿǍƶǆǍ ǂǴǍǍƶƮ

ǅƥǅ ĭƊ ÜǂǒǆƨǁƤ ýǴƞǆ Ŏ5 ŎǆǒǁƶǩƑƒ ƔǍƪǴơ!ƒ ýǴƞǆ Ŏ5 ǂƮƮƤǩǆ!ƒ ƨƥƒǂ!ƒ ǂǁƿǍ ǍǋƘǍƿǆƶ!ƒ ǇǒƨǂǆǒƨǍǆ

ǂǒǆǇǆǕ Ŏ5ǴǂƊ ŎƵǍƊ ǂǁƿǍ ÜƔǍƪǴơ!ƒ ǅǒƥƤƪƒ Ǐǁǅ Ǵǒ5Ǵǂ ǴǆƨƥƖ ǇǒǋƨƥǆƒǍ ǇǒƥƶǒƶǆƖ ǇǒǆǁǆƶǩƑƒ ƨ5Ǎǩ

[illegible]

[illegible] .(56 :2003 [illegible]).

[illegible] :

[illegible] (Computer Graphics) [illegible]

[illegible] .(2006 [illegible])

[illegible] (41 :2010 [illegible]) [illegible]

.(44 :2011

(2003)

.(315-301 :2003

(Cameron, 2000)

:2010

(18

.(27 :1998

(2006)

LJdž ƨǒƶǂ ƥƥƵ ƔǒƨƥƘ ƓnjƶƘ ÜƩƨƒƥdž!ƒ Ǐ!ǫ ƔǍƪƓơ ƨƓnjƞ 100.000 ýƓƤƥǫ Ⅱ!Ʀ ǖƘ ÜƚǒǍǈƓǈ
.(47-46 :2011 ÜLJƓdžƨƬ!ƒ) ƚǒƞdžƨƶ 1000 Ǒ!ƒǍơ ШƓƘǈǫǍ ÜLJǒdžƶƶdž!ƒ

DŽƒƥƤƘƪƓƶ ƘƓǈǒƶƪ!ƒ ýƑƒǍD Ǒ5 ƚǒƶƨƶ!ƒ ýǍƥ!ƒ ƘDƥƶ ƥl5 ƚǒƶƨƶ!ƒ ƚƶƨƞƘ!ƓƶƨƶǁƶƘǒƓdžǒ5ƓdžD

ƚǒƒƥƶ Ǒ5Ǎ .ƚǒƨƒƥǗƒ ƨǍdžǕƒ Ǐ!Ƶ DŽƒƥƤƘƪǗƒ ƒƦǊ ƨǂƨǍ ÜlƥƥơdžƘǙƓƞdž Ǒ5 ƘƓƶdžƓƞ!ƒ Ǒ5 ƔǍƪƓơ!ƒ

ÜƘƒƥƓǒƵ) ƓnjǈdžƚǒǍǈƓǈ!ƒƚƮƓƤǍƩƨƒƥdž!ƒǑ5ƔǍƪƓơ!ƒýƓƤƥƶýǍƥ!ƒƱƶƘDƥƶƘƓǈǒǈƓdžǍ!ƒ

ƚǒǍǈƓǈ!ƒƩƨƒƥdž!ƒǑ5ƔǍƪƓơ!!ƓdžƒƥƤƘƪƒƚǒƶƨƶ!ƒýǍƥ!ƒýǍDLJdžƫƒƨƶ!ƒƘǈƓǂƚǒơÜ(94 :2004

Ü(1984) DžƓƵ DžǒƶƶƘ!ƒ ýƓƞdž ƔǍƪƓơ!ƒ ýƤƥ ƨƮdž Ǒ5Ǎ ÜDž1984 DžƓƵ LJƥƨǕƒ ƓNjǖƘ ÜDž1983 DžƓƵ

DŽƒƥƤƘƪƒ Ǐ!Ƶ LJǒdžƶƶdž!ƒ LJdž ƥƥƵ ƔǒƨƥƘ! ƒ ƮƤƘdž ƨǂƨdž ƓƓƬǈƶ DžǒƶƶƘ!ƒǍ ƚǒƶƨƘ!ƒ lƨƒƨǍ ƘdžƓp ƚǒơ

DžƓƵ!ƒ Ǒ5 ƚǒǍǈƓǈ!ƒǍ ƚǒƑƒƥƘƶǗƒ ƩƨƒƥƶdžƒǏ!ǫƔǍƪƓơ!ƒýƓƤƥƶƓǒƶƵ5ƨƮdžƘDƥƶǍÜƔǍƪƓơ!ƒlƨnjƞD

lƥƓdž ƩǒƨƥƘƶ ƚǒƥǍƵƪ!ƒ ƘDƥƶ DžǍ Ü(49-48 :2011 ÜLJƓdžƨƬ!ƒ) 1990 IJ 1989 Ǒƪƒƨƥ!ƒ

ƇƓƬǈǫ DžƘǍ ÜƚǒƥǍƵƪ ƚƪƨƥdž 23 Ǒ5 ƔǍƪƓơ!ƒ ýƤƥ Dž1987 DžƓƵ Ǒ5Ǎ ÜDž1985 DžƓƵ Ǒ5 ƔǍƪƓơ!ƒ

Ǒ5 Ǒ5ƨƶdž!ƒ ǑƵǍ!ƒ ƨƬǈ! LJǒ5ƱǍdž!ƒǍ LJǒdžƶƶdž!ƒǍ ƚƶƶƲƶ! ƚǒǍƶƨƘǍ ƚǒdžƶƵ ƚ!Ɠƪƨ DžǒƥlƘ! ƔǍƪƓơ! ƚǒƥǈD

Ü(26 :1987ÜǍǂƪǒƪǒǕƒ) ƓNjƨǒǍƲƘǍ DžnjƘƒƨƥƥ ƚǒdžǈƘǍ ƔǍƪƓơ!ƒ ýƓƞdž

: ƶǏdžƣƥǕƐ ƛlǈƑdžDžⅡƐ Ǐƺ ƒNjƨƑƟⅡƐ

ƓǒƞǍ!ǍǈǂƘǍ ÜDžƓƵ ýǂƬƶ ƓǒƞǍ!ǍǈǂƘ!ƒ ƚǒdžNjƶ LJƥƨǕƒ Ǒ5 DžǒƶƶƘ!ƒ LJƵ LJǒ!ǍƌƪdžǕƒ ⅡƒƨƥǗ ƚƞǒƘǈ

LJƓǂ Ü1983 DžƓƵ ƦǈdžƘƒƨƨl!ƒLJdžƒƥƥƵDžǒƶƶƘ!ƒǍƚǒƶƨƘ!ƒƩƶƞdžƦƤƘƒƥl5Üƒ ƓƤýǂƬƶƘƓdžǍƶƶdž!ƒ

ƥƥƵ ƨdžƘƪƒǍ ÜƚǒǍǈƓǈ!ƒ ƩƨƒƥdžƶǁƨƓǒƘƤƒǍǑƶǒƨƞƘýǂƬƶDžǒƶƶƘ!ƒǑ5ƔǍƪƓơ!ƒýƓƤƥǫƓnjdžNjD

ƚƪƨƥdž (22) Ǐ!ǫ 1987 DžƓƵ Ƙ!ƮǍ ǏƘơ ƥƓǒƥƨǗƓƶƚƶƨƞƘ!ǈƦNjǑ5ƘdžƥƤƘƪƒǑƘ!ƒƩƨƒƥdž!ƒ

[illegible] 1987 [illegible] (53 :1987 [illegible])

[illegible]

[illegible]

[illegible]

[illegible] 2000 [illegible] (40) [illegible]

[illegible]

[illegible] 1999

[illegible]

.(95 :2004 [illegible])

[illegible] "

[illegible]

[illegible]

[illegible]

[illegible] (97 :2004 [illegible]) " [illegible]

.(46 :2011 [illegible])

[illegible]

(Paintbrush + [illegible] (Printshop + Dos) [illegible]

[illegible] Dos)

- 1995 [illegible]

[illegible] (1998 - 1997 [illegible] 1996

.(16-15 :1998

[illegible] 2006 [illegible]

(Power [illegible] (Corel Draw) [illegible] (Photoshop)

.(66 : 2006 [illegible]) (publisher) [illegible] Point)

: (**Computer Graphics**) [illegible]

[illegible]

.(2005 [illegible])

[illegible]

ǻǀ!ƒ ƨĂƱƙ ăƥǁ ƥƿĂ Ü(2010 ÜƧǀƮ) ǉƥǒƥƞ!ƒ ǻǌǛƸƒƥƴ ǻǒƥǀƙ! ƀǒǻƿƧ!ƒ ƱƑƓǐĂ!ƒĂ ƔĂǐƓơ!ƒ ýǖƤ
ƀǒƧƮƴ!ƒ ǇĂǅ!ƒ Ǐ!ǫ ƀǒǁǒǂƮƙ!ƒ ǇĂǅ!ƒ ǇǄ ƀǒǄǐƙ!Ƒƴ ýƑǀƙǅǗƒ Ǐ!ǫ ƔĂǐƓơ!ƒĂ ĂǒƥǒƗ!ƒĂ ÜƧƨǒǀ!ƒ ƨĂǌƯĂ
:2011 ÜǇƑǄƧƮ!ƒ) (New Media) ǉƥǒƥƞ ƱƑƓǐĂ ǇĂǅ!ƒ ǉƦǋ ƇƒĂƙơǗ ǁ!ƦĂ Ü(Visual Art)
.(92

ǏǀƵ ýǄƸ!ƒ ǇǄ ǋǅǂǄǙĂ ǇƑǅ!ƒ ƳƒƥƴǴ ǇĂƥƴĂ ÜƧǒƶǙǀ! ǉƒƥǂ ƔĂǐƓơ!ƒ ǇĂǅƑǅ!ƒ ǻƥƤƙǐƒ
ƑǒƞĂ!ĂǅǂƙƒƦ ǊǄƥƴ ǇƑǅ!ƒ ǻƑǃ ƀǒơ ÜƀǒǅƑ!ƒ ƀǒơƑǅ!ƒ ǇǄ ƑƷǒƶưĂ ƒƨƞƑƵ ƔĂǐƓơ!ƒ ýƱǒ ƀǒơ ÜǊǐƞǄƒƨƴ
ƀǒƥǒǁǙƙ!ƒ ƘƑǒǅǀƙ!ƒ Ǉǒƴ ƴǄƞǒ ǇǒǅǅƑƙ!ƒ ƇǕƋǌ ƔǀƩĂ ÜƀƮƑƤ!ƒ ǊƙƑƞƑǙơƒ ƔƓƑǅƙ! ǊƙƑƸƒƥƴƒ Ǒ5 ƀǒǄƿƧ!ƒ
ƑǌǄ! ýƑǀǄ Ǒ5 Ü(2010) ƧǀƮ ƘơưĂǁĂ Ü(Clarke, 2003: 1) ǁƧǖƀ ǻǌ!ƑǄƸǁ Ǒ5 ƀǒǄƿƧ!ƒĂ
ǉƒƥǕƒ ǉƦǋ ƎǀƤĂ ÜǉƒƥǁǗǫ ĂǌǄ ƑǄ ƔĂǐƓơ!ƒ Ǉǁ "ƤƑǅ5 ǉƧƑƸƺƒ ǇƀǄǒ ýǋ .. ǑǄƿƧ!ƒ ƨǒĂƮƙ!ƒ" ǇƒĂǅƶƴ
ƘƑǅƑƴ!ƒ ǇǒƴƸǅƞǒ ƑƓǅƑƞǄǄ ǖƀ ǻǒƥǀƙ Ǒ5 ǋǙƑǅƀǄƒ ýǆƙƓǒ ǏƦ!ƒ ǇƑǅ5!ƒĂ ǇƑƓǅǕƒ ƑǄƥƒ ƥƞĂǒ
ƩơǇǒƴĂ -ƔĂǐƓơ!ƒ ýƤƒƥ ƀǒǄƿƧ!ƒ ƘƑǀǄƸ!ƒ ƩƑƓǁ ǑǋǄ Ǒƙ!ƒĂ - ǉƥǄƑƞ!ƒ ƀǒưƑƧ!ƒ ƘƑǀǄƸ!ƒĂ
.(2010 ÜƧǀƮ) ǋǙ5ƱƑƵ ƐƔƥĂ ǉƧƀ5Ă ǇƑǅ5!ƒ

Ǒ5 ƀǒǄƿƧ!ƒ ƘƑǒǄǐƙ!ƒ ǻƒƥƤƙƓƴ ǻĂǀǒ ǏƦ!ƒ ǇƑǅ5!ƒ ƷƮĂ! ǻƥƤƙǒ ƠǀƱƮǄ ǑǄƿƧ!ƒ ǇƑǅ5!ƒĂ
ǻƓƧ!ƒ ƨǋƶƵĂ Ü(Paul, 2014) ƧƮƺǄ!ƒ ǇƸ!ƒ ǏǀƵ ƽǋƱǇǒ ƠǀƱƮǄ ĂǋǄĂ Üƀǒǅ5 ýƑǄƵǁ ƜƑǂǇǫ
ƀ5ǁƙƤǄ ƘƑǒǄƓƙǋ ǇƸ!ƒ ƒƦǋ ƨǌƯǒĂ ÜƀǒƥǒǁǙƙ!ƒ ǇĂǅ5!ƒ ǇǄ ǊǋƓƓ ƑǄƵ ƀ5ǁƙƤƙ!ƒ ǇĂǅ5!ƒ ǇǄ ƔĂǐƓơ!Ƒƴ
ǇƸ!ƒ ÜǑƀǒ5ƒƨƞ!ƒ ǻǒǄƮƙ!ƒ ÜƔĂǐƓơ!ƒ ƘƑǄĂǐƧ ÜƔĂǐƓơ!ƒ ǇĂǅ5 ÜǑǄƿƧ!ƒ ƨǒĂƮƙ!ƒ ǇƸ :ýƴǄ
.(78 :2007 ÜƧĂƮƺǄ Ăƴǁ) ƀ!Ǘƒ ǇƸ ÜǑǇĂƧǂƀ!Ǘƒ

Ł!Ănjʅ ýǂƕ ŎǉƸ!ƒ ýďžƺ!ƒ Ŏ5 ŁőǁŏǂŢķ!ƒ ƧƮǤǉƺ!ƒĂ ƩʅŰƒ ƽőƕƱķƕ ĎĭĂǀŏ ǇĐ ƔĂʅǤơ!ƒ ƳǤƱķʅƒ

ǋǁďƵ ŁőƌƧ ǇďǎǇǤǉƸ!ƒ Ǉǂďǩ ƚőơ ÜŁőƥőǁǀķ Ʀő5ǉķ ŁǀőƧƱ ĭĐ ǤnjʅƼǤǉķ ǇĐ ǇǂďǎőŬ ÜŁő!ǤƵ ŁƵƧʅƕĂ

ǇőőďǏƧ!ƒ ǇőǉǤǉƸ!ƒ ƧnjŢĐ ǇďǎĂ .Łőǉƽ!ƒ ƧƮǤǉƺ!ƒ ǇďǎĭĐ Ƨőőƺķ ýőƥƺķ ŁőǉǤǂďǭĂ ÜƔĂʅǤơ!ƒ ŁŢǤŢ ĬǁƵ

ƨƞőƥ Ŏƞőƕ Ü(Genny Holzer) Ƨƨ!ĂNj Ŏǉƞ Ü(Barbara Kruger) ƧƞĂƧǂ ƒƧƕƧǤƕ

ýĂnjʅĂǂ ǇőƒĂ Ü(JD Javis) ƨőƼƧǤƞ ĭƥ Ŏƞ Ü(840 :2005 ÜǀƨďǎơƆƒ) (Peggy Diggs)

.(2010ÜƧǀƮ) (Susan Chapman) ǇǤďǎƕǤŢ ǇƒƨĂʅ Ü(Wayne J. Cosshall)

ǇƕŎǂőƧďŰƒ ǇǤǉƸ!ƒ ǇďǎƘĐƥƕ ǦőƤőƧǤķ ƔĂʅǤơ!Ǥƕ ĎʅƧ!ƒ Ǉ5 ƧĂƱķ ýơƒƧď ƨƧƕĐ ǇǫŎďǎǐƧ!ƒ ƧőĂƮķ!ƒ ǇƸ! ƻőƧƺķ ýĂĐ ƧnjƲĂ ÜŎďǎǐƧ Ǉ5 ŁơĂ! ýĂĐ ƴǉƮ ƚőơ 1950 ĎǤƵ Ŏǂʅǉ5Ă!

ĎĭĂnjƸď ƩʅƌďǏ Ü(Max Bense) ƨǉƕ ƩǂǤď ŎǉǤďǏ!Űƒ ƻĂʅǁőƸ!ƒĂ Ďǐ!Ǥƺ!ƒ ƥő ĬǁƵ1953 ĎǤƵ

Łő!ǤďǎƞƒƦ ǁǁķ" ǋǇĐ ŎďǎǐƧ!ƒ ǇƸ!ƒ ƻƧƵ ƚőơ Ü(Information Asethelics) ŁőķǤďǎĂǁƺďǎ!ƒĂ ýǤďǎƞ!ƒ

Ŏ5 ǀƥőƥƺ!ƒ ƨǉƕ ƚĂơƕ! ŁƞőķǉǂĂ Ü"ǇƸ!ƒ Ǉďǎ ǤƵĂǉ ɯǤķǉǫ Ŏ5 ǤǉķƥƵǤʅď! ǤnjķƞďǎƧƕ Ďķ Ł!Ơ ǇƵ ǀƥ!Ăķď!ƒ

ƘǤơĂ! ɯǤķǉǫ Ŏ5 ƧķĂőƕďǏǂ!ƒ ƘǤǉǤǂďǭ ƘǁƺķʅƒŎķ!ƒ Łőǉƽ!ƒ ƯƧǤƺď!ƒ ǇďǎƥőƥƸ!ƒ ƘďǎőƥĐ ǉǤƞķŰƒ ƒƦNj

Ǉ5 ýǤƞď Ŏ5 ƚơƕķ Ŏķ!ƒ Ď!Ǥƺ!ƒ Ŏ5 ýĂƥ!ƒ Ĭ!ĂĐ ǇďǎǤőǉǤď!Đ ƘơƕƮĐĂ ÜŁő!Ǥďǎƞ ƘǤƽƮ ýďǎơķ Łőǉ5

.(2010 ÜƧǀƮ) ŎďǎǐƧ!ƒ ƧőĂƮķ!ƒ

ƩŭƹĂƥ ĎǤƥĂ ÜǤƜőĐ ǤǂőƧďĐ Ŏ5 ƔĂʅǤơ!Ǥƕ ŁƺǉƮď ǀƧĂƮ ýĂĐ ƘƧnjƱ 1957 ĎǤƵ Ŏ5

Ǉďǎ ĂNjĂ Ü1963 ĎǤƵ Ŏ5 ƔĂʅǤơ!ƒ Ǉƽ! ŁǀƕǤʅď ýĂĐ ýďǎƺƕ (Douglas Englebart) ƘƧǤƕǁǂǉƒ

ĎǤƵ ƘƧǤƞƥőķʅ ǤőǉǤďǎ!Đ Ŏ5 ƔĂʅǤơ!ƒ Ǉƽ! ƯƧƺď ýĂĐ ĎőƥĐĂ Ü(Mouse) ǀƧƌƽ!ƒ ƻǤŢķǂƋƕ ĎǤƥ

ǇǤǉƸ!ƒ ƧnjķŢĐ ƥƥĂ . (wise) ƨőƒĂ ŁőǂőƧďŰƒ ǁǁƧĂőĂőǉ ŁǉőƥďǏ Ŏ5 ýƛǤďǎďǏ ƯƧƺď ǉŭķ Ü1965

ǇǍǈǣ!ƒ ýǴɳǆ Ŏ5 ƔǍʅǴơǃ! ŎƵƒƥǃŰƒ ǄƒƥƤƙʅǛƒ Ʃʅǅ ƻƬƙǂƒ ǂŏơ ŎǆžƨƧ ǇǴǈǂ ĭƒƨǍʅ ƨ!ƨǴƬƙ

ǂƑŏǋ ýǍǅ Ʃŏʅǲǃ ƷƨǃǈƬŏƨ ƘƨǃǍƨ Ǎ ƨ5Ǎǃǂ Ŏǃŏǃ ǇŏǈǴǈǣ!ƒ ǄǴƿ ǂǈʅ!ƒ Ʃ5ǈ Ŏ5Ǎ Ü1967 ǄǴƵ Ŏ5

Ü(Carlson, 2003: Section 9) EAT ĬƵƥƙ ǇŏʅƥǈǌǆžǃƒǍ ǇŏǈǴǈǣ!ƒ Ǉŏǃ ýǆǴƶƙ!ƒ ƨŏǍƱƙ! ǂŏǆʅƨ

ǂǆƱǈǆ ýǍǅ Ʃŏʅǲǃ (Evance) ƩǈǴ5ŏǫǍ Ü(Suther Land) ƥǈŬ ƨƛǍǴʅ ǄǴƿ 1968 ǄǴƵ Ŏ5Ǎ

(Special ù! ƨǴƮƙƤƒ ŎǋǍ Ü(SIGGRAPH) ǄʅǴǃ Ƙŏǆʅ ƔǍʅǴơ!Ǵǃ Ǆʅƨ!ƒ ýǴɳǆǃ Ĭǈƶƙ

.(15 :2007 Üĭƥʅǖƒ) Interest Group on Computer Graphics)

Ư ƨǴƶǆ!ƒ Ǆǋǅ ƥơǅ ǍǋǍ Ü(Cybernetic Serendipity) Ư ƨƶǆ ǂǈʅ!ƒ Ʃ5ǈ Ŏ5 Ǆŏƿǅ

ǄǋǅǅŏǍ5 ǁƨǴƮ ĭƦ!ƒǍ ǇƥǈǇ Ŏ5 ǀƨƮǴƶǆ!ƒ ǇǍǈǣ!ƒ ǂƑŏǋ Ŏ5 ǄŏƿǅĭƦ!ƒǍ ŎǆžƨƧ!ƒǍ ƔʅǍơǆ!ƒ Ǉ5ǃ!

ǁŏǴǃ ǇǍɳ ǄǴǈ Ü(Mithal Noul) ýǍǈ ýǴƛǆ Ü(Charles Curie) ĭƨǍǂ ƨ!ƨǴƬƙ :ýƛǆ ǇŏǈǴǈǣ!ƒ

Ǎ (John Whitney) Ŏǈƙŏ Ǎ ǇǍɳ Ü(Frieder Nake) ǁǴǈ ƨƥŏƨ5 Ü(Nam June Paik)

ƻƬǂŏ ǇǅƳǴƱƙʅƒ ǂŏơ ǊƵǍǈ ǇǆýǍǕƒ Ư ƨƶǆ!ƒ ƒƦǋ ǇǴǂ ƥƤǍ Ü(John Gage) ǅǴƸ ǇǍɳ

ƨǴǈ!Ǎ ǄƒƨŏƏ ǂǈǴǈǣ!ƒ ƘǆǴƿ ƥƤǍ .ǇǴǈǣ!ƒ ƳƒƥǃǊ ǀƥǴŏƨ Ŏ5 ǴŏɳǍ!Ǎǈǂƙ!ƒǍ ƔǍʅǴơ!ƒ ǄƒƥƤƙʅƒ ǀƨƥƤ

ǀǍƤ Ƙ5ƻƙǂƒ ǂŏơ "ƳƒƨƙƤŬƒ ǂ!ƈ" ĬǆʅŏǇǆǴǈƨǃ ƳƒƨƙƤǴǃ ǂǈʅ!ƒ Ʃ5ǈ Ŏ5 (Veram Welnar)

ǴǌǊ!Ǎ ƘǴƶǃƨǆ!ƒ ýƛǆ ǂŏʅƥǈǌ!ƒ ýǴǂƬǕƒ ýŏǍơǃ Ǵǌ!ǴǆƵǅ ƘƨŏǆƙƥƤǍ ÜƳƒƨƙƤǍǇ5!Ǵǃ ƔǍʅǴơ!ƒ

.(Carlson, 2003: Section 9) ǇʅʅƨǴǂ ǴǌǈǆǍ ǅƒƨɳǅ ƠʅǆǍ ǴǌǃŏǂƬƙ ǀƥǴƵǫǍ

ǊǋŏŏǍ5 ǁƨǴƮ ǂŏơ ƩŏƨǴǃ Ŏ5 ǂǆžƨƧ!ƒ ǇǍǈ5ǃ! (one man) Ư ƨƶǆ ǄŏƿǅǄ1969 ǄǴƵ Ŏ5

ÜǊǃǂƬ ĬǃƵ ýŏƥƶƙ!ƒǍ ǴŏƒǍƨ ǀƥƶǃ Ǌ5!Ǎ ƔƶǂǆžƒĬǃƵ Ǌ!ǴǆƵǅ Ŏ5 ƥǆƙƶŏ ǇǴǂ ĭƦ!ƒǍ ÜƨǌǆžƥƨǈǴǆ ǇǴǈƷ!ƒ

ǄŏǆƮƙ Ǆƙ Ǆ1973 ǄǴƵ Ŏ5Ǎ ÜǄ1971 ǄǴƵ ƩŏƨǴǃ Ŏ5 ƔǍʅǴơ!Ǵǃ ƳǍǈƮǆ Ǉ5 ƻơƙǆ ýǍǅ ƩʅƛǍ

Ư Ƨƶď ĎĭŏpĎ ĎĭĠƶ!ƒ Σ5Lj Ŏ5Ă ÜƔĂƖĠơ!Ģħ ĎĭƖƧ!ƒ ƘĠŏLjǀƙ ĎĭƒƥƤƙƖĢħ ǁƧơƙďƶ ŎLjĂƙƧǂ ĎĭĬŏ5 ýĂĎ ɯĠƙLjĝĂ

ǂƱƖƒĂħ Ģnj!ĢďƵĎ ýĂĎ ƧƥƮ Ŏƙ!ƒĂ ƧŋĂƧǂ ƒƧħƧħ ǂLjĠLj5!ƒ ǸŏƼ ƘǂƧĠƮ ĭƦ!ƒ Whitney Bienmal

LJǕ ǁ!ƦĂ ÜƖĎƧď!ƒ ǂďďƮď ĢnjŏĬƵ ƽĬƱĎ Ŏƙ!ƒĂ Ďĭ1989 ĎĭĠƵ Ŏ5 Illustrator ƧƙŏƧƙƖŏ!ƒ ǇďĠLjƧħ

ĢnjŏƖĐďĂ ƖĎƧď!ƒ ýƥƒĂ LJƵ Ƨħƶƙ ƘLjĠǂĂ ýďƙŋď!ƒ Ŏ5 ǂŏĂƛLjǕƒ ǂǀħƱ!ƒ ƻƥnjƙƖƙ ƘLjĠǂ Ģnj!ĠďƵĎ ĎĭƱƶď

.(Carlson, 2003: Section 9) LJƖ!ƧĠǂ

(Paint ĎĭƖĢħ ƔĂƖĠơ!Ģħ ĎĭƖƧ ǇďĠLjƧħ ƧnjƱ 1980 ĎĭĠƵ Ŏ55 LJ5!ƒ ƒƦǋ ƧĂƱƙ ƧďƙƖƒ

ǇďĠLjƧħĂ Ü(Aobe Photoshop) ƔĂƬĂƙĂ5 ŎħĂƥĎ ǇďĠLjƧħ ýLjƮ Ďĭ1986 ĎĭĠƵ Ŏ5 Ljǚƙ ÜBox)

LJďĂ ÜĎĭ1989 ĎĭĠƵ ĎĭŏďƮƙ!ƒ Ďĭ!ĠƵ Ŏ5 ƖƧĂƛ ǂƥơĎ ĭƦ!ƒ Ü(Aobe Illustrator) ƧƙŏƧƙƖŏ!ƒ ŎħĂƥĎ

Ŏ5 ĠƮĂƮƤĂ ƔĂƖĠơ!Ģħ ĎĭƖƧ!ƒ ýĠŋď Ŏ5 ýƑĠǋ ƧĂƱƙ!ƒ LJĠǂ Ďĭ1995 ĎĭĠƵ Ĭƙơ ǸLjĎ ƧǂƦ!Ģħ ƧŏƥŋØ!ƒ

ÜƘĠLjŏƶƖƙ!ƒ ƧƤƒĂĎ ĬƙơĂ LJĂƙƧǂ!ƒ Ďĭǚ5Ď Ŏ5 Ơưƒ Ă ýǂƬħ ƘƧnjƱ Ŏƙ!ƒ ƥĠƶħǕƒ ǂŏƛǚƛ ýĠǂƬǕƒ ĎĭƖƧ

ýǂ ƘơħƮĎ ǂŏơ ÜǂŏƥŏĬǀƙ!ƒ Ɣŏ!ĠƖǕƒ ýǂ ĠǋǚƙĠďĂ Ďĭ2000 ƖƧƙ5 Ŏ5 ýĠŋď!ƒ ƒƦǋ ĬƱƤƙ ƥpĂ

ÜƧĂƬĠƵ ĂħĎ Ý16 :2007 ÜĭƥƖǕƒ) ƔĂƖĠơ!Ģħ ĎĭƖƧ!ƒ ƘƒƨĠŋLjĝ ĎĭƵƥƙ ǂƛŏƥơ!ƒ ǂŏŋďƧħ!ƒ ƘĠƷĬ!ƒ

.(82-81 :2011 ÜLJĠďƧƬ!ƒ Ý80-70 :2007

LJĠŋƧnjď Ŏ5 Ü(JD. Jarvis) ƨŏ5ƧĠŋ ĭƥ Ŏŋ ƥpĠLj!ƒĂ ŎďpƧ!ƒ LJĠLj5!ƒ ýƮơ ƥpĂ ƒƦǋ

ĬĬƵ Ďĭ2000 ĎĭĠƵ LJĠħĠŏ!ƒ Ŏ5 ĎĭŏpĎ ĭƦ!ƒ Ü(Digital Creative Awards) ŎďpƧ!ƒ ƳƒƥħǗƒ

ĂǋĂ ŎďpƧ!ƒ ƧŏĂƮƙ!ƒ ýĠŋď Ŏ5 ǂŏĬŏĬơƙ!ƒĂ ǂŏƥǀLj!ƒ ƘĠħĠƙǂ!ƒ LJďď ƥŏƥƶ!ƒ ǸŏƥƙĂ ÜăƧħǂ!ƒ ƖƨƑĠŋ!ƒ

"ƧƙĂŏħďǂ!ƒ Ŏ5 ƠŏƙĠ5ď!ƒ ǂơĂ! ĬĬƵ (LJ5) Ƨƨ ǁĠLjǋ LJĎ LJĂƧŏƛǂ!ƒ ƥǀƙƶŏ ýƒƨŏ Ǘ " ǂ!ĂǀďƖƒ ƔơĠƮ

.(2010 ÜƧǀƮ)

[illegible] :

[illegible]

[illegible] (2014 [illegible]).

[illegible] : (Carlson, 2003) [illegible]

- [illegible] (2D): - [illegible]

- [illegible] (3D): - [illegible] (Martin [illegible] Newell) [illegible] 1975 [illegible] (Utah).

- [illegible] (Vectors): - [illegible]

[illegible]

- [illegible] :(Pixels) [illegible]

- [illegible] :(Animation) [illegible]

[illegible] .(Carlson, 2003)

[illegible] (Adobe Illustrator) :

[illegible] (Illustrator) [illegible] (Illustrate) [illegible] 1986 [illegible] (Vectors) [illegible] .(2014 [illegible])

[illegible]

[illegible] (DUG, PDF, JPG, PNG) [illegible]

.(Adobe Illustrator CC, 2014) [illegible]

[illegible] (Tout & Kinkof, 2003) [illegible]

[illegible] (Adobe Illustrator Mini Bible) [illegible]

[illegible] (Vectors) [illegible] (Pexils) [illegible]

.(Tout & Kinkof, 2003: 8) [illegible] (Photoshop) [illegible]

(Adobe Illustrator) [illegible]

- [illegible] **1.6-1** (**88**) **(88) (1-1.6)**: [illegible] (Adobe) [illegible] (Apple Macintosh) [illegible] 1986 [illegible].

- [illegible] **2-5** **(2-5)**: [illegible] (Adobe Illustrator) [illegible] windows [illegible] 1989.

- ǀƐƥƐƣƬƏ 6-10 **(6-10)**: ƬƥƧƘ ŎƼ ƘƴƥơƉĂ 1996 ƉǁƵ ŎƼ ƖƧĂƛ ƉǁƵ ƉƗƵ ƝďžƒƧǀ!ƒ ÜŁödžpƧ!ƒ ƚöǀ Ƌǁƙ ƧöĂƱƙ ŁǌƞƒĂ ýďžƸ!ƒ ŁƼǁƯƺĂ ƘǁďžƥƤ ýöƥƸƙ ƧĂƬ!ƒ ƠǁƬö! ƝǀǁƬďž ƝďžǁǈƧǀ! ŎǀĂƥƉ ÜƗƧ (Adobe Photoshop) ƔĂƬĂƙĂƼ Ơǁƙö ƘǁďžƥƤ Ɖǀ!ƒ ǀƧ!ƒĂ ĭĂƥö!ƒ Ɖǀ!ƒ ǀƧ!ƒ yôƧǀ!ƒ ǈǀöĂǁƙ!ƒĂ ŁƱǀƒĂǀ ƝďžǁǈƧǀ!ƒ (Design Tools, 2013).

- ǀƐƥƐƣƬƏ CS ƨ - CS6 ƨƐ **6** (**CS-CS6**): ĂƝĂ ƒƤƙƬǁƧ (Creative Suite) ŎǀƸƙĂ ƟǁǈƞŎƙ ƒƥǀƒǋ ÜƳƒƥǀƙƙ ǈƝƝǈ ƣǀǈ!ƒ ƉöďžƬƙ!ƒĂ ýöƥƸƙ!ƒĂ ĬǀƵ ýǁŁƬǖƒ ŁöǖƩ ƥǁƸǀǗƒ ŁƼǁƯǗǁ ĬǀƵ ƘǗöƥƸƙ!ƒ ǀƥöƥƞ!ƒ ĬǀƵ ǈƝǈ ŁƤǀǈ!ƒ ǁďžĂ ÜǁƝǈƥƸǀ ǁƯǗǁ ĬǀƵ ƥöƥƸ!ƒ ǈďž ƘǁďžƥƤ!ƒ ǈƘǁďžƥƤƙǀďžǀǀ! ŁďžǀƤ ýöƥƸƙŁ ǈƒǗǀ!ƒ ǈƒǗǀǀƒĂ ǀƥǁƯǁ ýǁďž ýƼƧ ăĂƙǀďž ŁǀǁƵƼ ƘǁďžƥƤ!ƒ ŁďžöƥƗ!ƒ ƧöƼĂƙĂ ƥƥƵ ƧöŁ ǈďž ƱĂƱƤ!ƒ ǈƒǗǀƒĂ ǈƙ!ƒ Ơöƙƙ ǈƥƤƙǀďžǀǀ! ƉďžöďžƬƙ!ƒ ŁöǖƵƼǀ ƧǀŁƉ (Nack, John, 2007).

- ǀƐƥƐƣƬƏ **CC**: ĂƝĂ ƒƤƙƬǁƧ (Creative Cloud) ŎƵǁǈƙĂ ŁǁƠǀ!ƒ ÜŁöƵƒƥǀǗƒ ĂƙƙǁƯ ǈďž ǈƝǈ ŁƤǀǈ!ƒ ƘǁǈöǀƠƙ ĬǀƵ ǈƒĂǗƒ ƱĂƱƤ!ƒĂ ƱǀƯĂ ƘƒƥƥƵǗƒ ƘƒƧƥƙĂ ƝďžƥƙĂ ǈǀö ƝƒƧƥƤ!ƒ ƘƒǀǈƠǀ!ƒ ǈǀǈƠöƙƙ ƝďžǁǈƧǀ ƔĂƬĂƙĂƼ (Photoshop) Ü ƧƙöƧƙǀö!ƒĂ Ŏǀ ƒƩ 6 (Illustrator CS6) Ü Ơöǀ ƠǀƙƙƝǈ ŁƤǀǈ!ƒ ǀƒƥƤƙǀƒ ýöďžƞ ƳƒǈƉ ƧĂƬ!ƒ (Adobe Illustrator CC, 2014).

ǌƝǁƧ ƥƝǀǈ ĬǁƗƨ ĬǁƝǈƘ ƥƤƥŁƨĭƐ (**Adobe Illustrator**):

- ǁǈƝǁ ƥĭƝǁ **(Joel C. Boyer)** ÜĂƝ ƥƠƉ ǈǀöƥǈǀǖ!ƒ ǈǀöǈǁǈǀ!ƒ ƠǁƠƬ ý ĬǀƵ ƥƩƧŁ ǀǁǖƒǁ!ƒ ƩĂƧĂƗ!ƒ ƘǁǀǁǈƵ ǈďž ŁƸďžǁƩ ƒǁǖƯöý ŎƼ ƒöƧǁǈǈĂƒ ŎƼ ƘƬƥ ƒ ǈǈĂǀǀ!ƒ ǈǀƒĂǀǁ!ƒ ŁƧƒďžƒĂ ÜŁƒďžǀƬ ĂƒǁƙĂ ǁ ǈƉ öǖƵǀ Ƨ !ǈǀƵǀ ƛĂƧ ƥöƥƙ ŁǀƘƤďžĂ ǈƼöďžǀǈ ǈǀƵ ǈǀƼöǈǀ ÜƉǈǀǈǀ ŎƥǁǁǈǀŁ ǁƤǀ ƠĂƒý ƝďžƥƤ!ƒ ǈǀƤǀ ǈƥƤƧ!ƒ ǈƥƤƙǀƒĂ ÜŁƤďžƒ ƬǀǀƗ Ĭǀǀ Ŧ!ƒǁƥǈŁ ǁǀǖƒ

[illegible]

[illegible] (Illustrator) [illegible] (Illustration, 2014).

- [illegible] (Koichi Fuji) [illegible]

[illegible] (Illustrator) [illegible]

[illegible] (Illustration, 2014).

- [illegible] (Richard Phipps) [illegible]

[illegible] (Illustrator) [illegible] (Illustration, 2014).

- [illegible] (Jessine Hein) [illegible] (Illustrator) [illegible] (portrait) [illegible] (Illustration, 2014).

[illegible] - [illegible]

[illegible]
[illegible] (Corel Draw) [illegible]
[illegible] (Power Point) [illegible] (Photoshop) [illegible]
[illegible]
.(76-66 :2006 [illegible]

[illegible] (Corel Draw) [illegible]
[illegible] (Power Point) [illegible]
[illegible]

[illegible]

ǏǃƵ ƗƕĂƶƮ ƘƒƦ ăƧƤƊ Ɨǌƞ ǇǅǆǈǍ ǊǅƒƧƕ!ƒ ǁǁƙ ǄƒƥƤƙƪƒ Ǒ5 ƖƧƕƤ ƩƧƥǅǃ! ǇǄǂ Ǉǉ Ă ǗǄǌǅǃƶƙ

ǇǂǅǑ ǗǄǌƪǑƧƥƙĂ ǊǅƒƧƕ!ƒ ǁǁƙ ǄƒƥƤƙƪƒ Ǒ5 ǄǌƙƧƕƤ ǉǘƤ ǇǅĂ ƗƛơǄƕ!ƒ ƧƱǈ ƗǌƞĂ ǇǅĂ ǗƗƕǃƱ!ƒ

ƔĂƬĂƙĂ5 ǊǅǄǈƧƕ ǇǅǍ ǉǂ! ǊǑƕƬ ǊǅǄǈƧƕƕ ƜǄǌǈǅǍ!ƒ Ǒ5 ƗơĂƧƱǅ!ƒ ǊǅƒƧƕ!ƒ ǉƒƥƕƙƪƒ

ǊƑǄƙǈ ǑƱƶǑĂ Ǆǃƶƙǃ! ǉǌƪƊ Ǉǂ!Ă Ǘ(CorelDraw) ĂƧƥ ǉƧĂǂ ǊǅǄǈƧƕĂ Ǘ(Photoshop)

ǇǑƕĂ ǊǇǑƕ ƗǈƧǄǈǅ!ƒ ǉǘƤ ǇǅǍ ǁ!Ʀ ƠǑƯĂƙ ǇǂǅǑĂ Ǘ(Illustrator) ƧƙǑƧƙƪǑ!ƒ ǊǅǄǈƧƕ ĂǊǈĂ Ǘǉư5Ɗ

-:Ǒ!Ǆƙ!Ǆǂ ƖƧĂǂƦǅ!ƒ ǊǅƒƧƕ!ƒ

- ǄǅǊǈƧƒƥƮƒ Ǆƙ Ǘ**(Illustrator)** ƥƗƥƗƨǏǁƐ ƛǄƑǅƥǄǊ Ǚ**(Photoshop)** ƒǊǈƪǊƗǊƺ ƛǄƑǅƥǄ

Ǌ!ǄƶǍ ǊǅǄǈƧƕ ƔĂƬĂƙĂ5 ǊǅǄǈƧƕ ƧƕƙƶǑĂ Ǘ(Adobe) ǑƕĂƥƊ ƗǂƧƬ ǑǊǈĂ ƗǂƧƬ!ƒ ƩƼǈ ǇǅǍ

ǊǅǄǈƧƕ ƩǄƪǗƒ Ǒ5 ĂǊǈ ǏƦ!ƒ ƧƙǑƧƙƪǑ!Ǘƒ ƩǂƵ ƒƦǊǈĂ ǗǄƪƧ ǊǅǄǈƧƕ ǊǇǈĂǂ ǇǅǍ ƧƛǂƊ ƧĂƮǃ!

.ǄƪƧ!ƒ Ǒ5 ƒ ƮƤƙǅ

- ǄǅƊ Ǘ(pixels) ƱǄǇǈ!ƒ ƭǑƧƱ ǇƵ ƘǄǈƑǄǂ!ƒ ƴǅ (Photoshop) ƔĂƬĂƙĂ5 ǊǅǄǈƧƕ ǉǅǄƶƙǑ

ǊǌƞƙǅǍ!ƒ ƱĂƱƤ!ƒ ƭǑƧƱ ǇƵ ƘǄǈƑǄǂ!ƒ ƴǅ ǉǅǄƶƙǑ5 (Illustrator) ƧƙǑƧƙƪǑ!ƒ ǊǅǄǈƧƕ

ƧƛǅƙƘ (Photoshop) ƔĂƬĂƙĂ5 Ǒ5 ǄǑǅǄƮƙ!ƒĂ ƧĂƮ!ƒ ǇƊ ǏƊ Ǘ(Vectors) (ƗǑƵǄƶƬǗƒ)

ƘǄǅĂƪƧ!ƒ ƩǂƵ ǗƗƕǃƱǃ! ǄǌơǑưĂƙ ƔƶƮǑ ƗǑǁǅƶ!ƒ ǈƦǊǈĂ ǗǄǊƧǑƕǂƙ ƥǈƵ ǉǀǑ5 ǄǌơĂưĂƕ

ǏƊ ǗƧǑƕǂƙ!ƒ Ɨƕƪǈ ƘƥƒƨǄǅǌǅ ƧƛǅƙǗ ǄǌǈƊ ƗǑơ (Illustrator) ƧƙǑƧƙƪǑ!ƒ Ǒ5 ǄǑǅǄƮƙ!ƒĂ

ƧƛǅƙǇǅǍ ƻĂƤƙ!ƒ ǇĂƥ ǊǇǅǍ ǄǄǌƙǇǗƒ ƥƶƕ ǄǄƬǑ ǄǅǂǊǅǑǅƮƙ ƧǑƕǂƙƕ ǄĂǀǑ ǇƊ Ɣ!ǄƱ!ƒ ƴǑƱƙƪǑ

.(2011 ǗǑǅǃƶ!ƒ ƔǄƪơ!ƒ ƨǂƧǅ) ǊơĂưĂ

- [illegible] (Illustrator) [illegible] (Photoshop) [illegible].

- [illegible] (Illustrator) [illegible] (Photoshop) [illegible] (2011 [illegible]).

- [illegible] (Illustrator) [illegible] (Photoshop) [illegible] (Paint) [illegible].

- [illegible] (Photoshop) [illegible] (Illustrator).

- [illegible].

- [illegible] (Photoshop) [illegible] (Illustrator) [illegible] (Illustrator) [illegible] (Photoshop) [illegible] .(2011

- [illegible] (Photoshop) [illegible] (Color [illegible] (Resolution) [illegible] Mode) [illegible] (Illustrator) [illegible].

- [illegible] (Illustrator) [illegible] .(Photoshop)

- Ü**(Corel Draw)** Njβq üβNjl ƛDŽFďβĠĠ **(Illustrator)** βĦβƗƨǏ ƛDŽFďβĠ lıďβƑʦDŽ qďY FDŽĊ

Ƨlıƙzŏ (Corel Draw) ĂƧβ ýƧĂǂ!ƒ NďĠǰƧlı ǇǂǃÜĎǃƖƧ!ƒ Ŏ5 ǇĠȚ ȚƤƙď ǇĠŋďĠǰƧlı!ƒ Ƨlıƙzŏ

NďĠǰƧlı ǏD ǇƵ NƙƒƧĠȚƙƤƒĂ ǉƧďƒĂD Ŏ5 βzlı!ƒ ýǂ βŏzlı ŎǉĠ!ƒ NďĠǰƧlı!ƒ ǇD ƗŏƠ ÜDďzƙď! Ɣz ȚD

.ǉƧďƒĂD ƱƽƠĂ NƙƖƧĠďď! Ƨlıǂ D ƘpĂ! ɯĠƙƠŏĂ ÜƧƤƒ

- Ɨŏ!ĠďŋĂ ƗƱĠƖlıIı lƨNjĠŋ ƘĠďĂƖƧĂ ýĠǂTD ǏƵ (Corel Draw) ĂƧβ ýƧĂǂ!ƒ ǏĂƙƠŏ Ǖ

.(Illustrator) ƧƙŏƧƙƖŏ!Ǖƒ ĠnjŏĂƙƠŏ Ŏƙ!ƒ ƘĠďĂƖƧ!ƒ

- ĂNj ĠďƵ ƻƙƤƙ (Corel Draw) ĂƧβ ýƧĂǂ NďĠǰƧlı Ŏ5 ƧďƒĂǕƒĂ ƘƒĂβǕƒ ƘĠŏďƖď Ǉǫ

NJ!ĠIƙǉƒ βǉƵ Ƨlıǂ D ƗlıĂzȚ βŋŏ Dďzƙď!ƒ ĂD Ɣ!ĠƱ!ƒ ǇD ǏD ÜăƧƤǕƒ NďƒƧlı!ƒ Ŏ5 NŏƵ ƻƧĠzƙď

.ƧƤĊ NďĠǰƧlı Dďzƙ!

- lďǏNjĠ βNjĠ ƛDŽFďβĠNj Û**(Adobe Illustrator)** βĦβƗƨǏ ǏĠNjqĊ ƛDŽFďβĠ DďǏĠ lıďβƑʦDŽFĠ

yď (Power Point) ƘǉŏĂlı ƧĂlı NďĠǰƧlı ǇD ƗŏƠ ƠưƒĂ ʦƧ5 ǁĠǉNj Ü**(Power point)**

NďĠǰƧlı Ʃŏ!Ă ƠƒƧȚ ƯƧƵ NďĠǰƧlı Ănj5 ƗƱŏƖlı!ƒ Ɨŏǉ5!ƒ Ƙűŏǂ Tƙ!ƒ Ưzlı ǏƵ NJƒĂƙƠƒ

.(Adobe Illustrator)ƧƙŏƧƙƖŏ!ƒ ŎlıĂβD NďĠǰƧlıǂ DƖƧ!ƒ Ŏ5 ƒ ȚƤƙď

- ƻƙƒĂnj!ƒ ǏƵ lƧŏƤǕƒ NƙƒƧƒβȚǫ Ŏ5 (Illustrator) ƧƙŏƧƙƖŏ!Ǖƒ NďĠǰƧlı ýŏďƠƙ ǇǂďŏƒƧŏƤDĂ

.ƘpĂ ǏD Ŏ5Ă Ɨ!ĂnjƖlı NďĠǰƧlı!ƒ ƗƖƧĠďď ǇĎ Dďzƙď!ƒ Ǉǂďŏ Ġďď ÜƗ!ĂďƠď!ƒ

[illegible]

[illegible]

[illegible]

[illegible] (1996) [illegible]

[illegible] (50) [illegible]

[illegible] (16) [illegible]

[illegible]

[illegible] (1998) [illegible]

[illegible] .(paint) [illegible] (26) [illegible] (27) [illegible]

[illegible] (27) [illegible] (27) [illegible]

[illegible]

[illegible] (PowerPoint) [illegible]

[illegible]

[illegible] (2006) [illegible]

[illegible] (30) [illegible] (35) [illegible] (28) [illegible]

[illegible] (30) [illegible]

[illegible] (Windows Movie Maker) [illegible]

[illegible] (Adobe Illustrator) [illegible]

[illegible] (2007) [illegible]

[illegible] (32) [illegible]

(Adobe Illustrator)

(2010)

(38) (19) (19)

.(Adobe Illustrator)

(2011)

(Photoshop) (Corel Draw)

[illegible]

[illegible] (Paint) [illegible]

[illegible] (Corel Draw) [illegible] (Adobe Photoshop) [illegible]

[illegible] (Windows Movie Maker) [illegible]

(Adobe [illegible]

[illegible] Illustrator) [illegible]

[illegible] (Adobe Photoshop) [illegible]

[illegible]

[illegible] (Paint) [illegible]

[illegible]

[illegible]:

[illegible] .(Vernon, 1988) [illegible]

(Students Perceptions of Computer use in Art [illegible]

[illegible] (Alberta University) [illegible] .Education)

[illegible]

[illegible] (Macintosh) [illegible]

[illegible]

[illegible]

[illegible]

[illegible] .(Hemmrla, 2000) [illegible]

(Factors [illegible]
related to the level of instructional use of Computer-Based Technology by
[illegible] .Missouri Secondary Art Teachers)
807 [illegible] 300 [illegible] (Missouri) [illegible]

[illegible]

[illegible] .(Po-Hsien, 2002) [illegible]

[illegible] .2002 [illegible] (Art Teacherĵs attitudes toward and
Experiences in the use of Computer teaching to conform with teaching

strategies stipulated in the 2002 Taiwanese first to ninth grade curriculum

ĬƜƵ ǇŏƵƨĂǆ ǇŏŏǉĂŏǘķ!ƒ Ŧŏǉǈ!ƒ ŦŏƕƧķ!ƒ ǇŏǆǆƶǆǊ ǇǆǊ ŦǉŏƵ ƧǘŏķƤƒ ǅķ ŀ ŏơ .alignment)

ǇǆǊ %58.6 Ǉƒ Ĭ!ǫ ǊƑǘķǉ!ƒ ƘƧǗƬƊ ƥpĂ .ŦǉŏƵ 293 ŷǆǌŋĂ Ɏǚƀķƪƒ ŷŏƨĂķ ǅķ ŀ ŏơ ÜǇŏķƵĂǆŋǆǊ

ǉƦǋ ǇǆǊ Ŧŏ!ǘơ!ƒ ŦƪƒƧƥ!ƒ ƥŏƽķƪķ .Ŧŏǉǈ!ƒ ŦŏƕƧķ!ƒ Ŏƽ ƔĂƪǘơ!ƒ ǘŏŋĂ!Ăǉǂķ ŷǘƤƥǫ Ŧŏư Ƨƽ ǅƶƥķ Ŧǉŏƶ!ƒ

.Σ ŏƧƥķ!ƒ Ŏƽ ƔĂƪǘơ!ƒ ǅƒƥƤķƪƒ ŦŏǆǊǈ ƥǂǅķ ǘǌǉǇ Ŏƽ ŦƪƒƧƥ!ƒ

ĂǂƳ ƒǋƨƑƟǁ ƑǔǕǋǁǋǆǀŦ ƥķǅŧ ƹĭǀ ǇƒĂǉƶƕ ŀ ơƕ ǗƒƧŋƕ .(Carin, 2006) ǇŏƧǗǂ ǅǘp

(How computer teachnology influences art .ƑĭǂƴǁƐ ǀƑƨƐƥǭǂǁ !ĩǅǅǂƬǂǁƐ ƛǅǅƐƥǘǋ ǅƶƻǁƐ

(lasierra (ƒƧŏƪ Ŏ!) ŦƶǆǘŋƕǍ .and design programs in higher education)

ƺƥǘǆķƵƒ ƘǘƶǆǘŋǓ!ƒ ƻǉķƤǆ ǇǆǊ ǅǆƶǆ 37 ƧǘŏķƤƕ ǇŏƧǗǂ ǅǘp ŀ ŏơ .ǘŏǉƧĂƽŏ!ǘǂ Ŏƽ .University)

ÜŦŏƬƤƬ ƘǚƕǘǀǆǊ ǗƒƧŋǫ ǅķ ƥpĂ .ǅǌ! ǇƜŏƕǘǀǆ!ƒ ǗǘǀķǉƒĂ ÜǅǅǋƥŋƒĂķ ŦŏƜƕǘp ÜǅǌǉķƧƕƤ ÜǅǌǉķƽǘǀƛƬ ĬƜƵ

ƥƑƒĂƽ ǇƊ ŦŋŏķǉƎƒ ƘǉǘǂĂ .ŎǉĂƧķǂ!Ǔƒ ƥŏƧƕ!ƒĂ ƻķǘǌ!ƒ ƭŏƧƀ ǇƵ ŷƬƒĂķ!ƒĂ ÜŦŏƽƬ ƘƒƧǘŏƨ

ŷŏƨŏ -3 .ƘǓǘǆǊƶķƪǓƒ ƥƥƶķǆ -2 .ƘǘƽǘǀƛƮƒ ŷǂ ǅƥƤŏ -1 ǋǉǉĂǂ Ŏƽ ǇǆǊǂķ ƔĂƪǘơ!ƒ ǘŏŋĂ!Ăǉǂķ

ǅǘǆǆƊ ŷǘŋǆ!ƒ Ơķƽ -5 .ǀƥŏƥŋ ŷǆƵ ƒ ƧƽŦơǘķǫ -4 .ŷŏǂƬķ!ƒ ƥĂƥơĂ ǇƽƜƒ ơǈŏƧǘķ! ŎǉǆǊƨ!ƒ ŷĂƥŋ!ƒ

ŦŏǆǋǈǊ ĬƜƵ ƥŏǂǅķ!ƒ Ŏƽ Ŧŏ!ǘơ!ƒ ŦƪƒƧƥ!ƒ ŷǆ Ŧǀƽķǆ ŦƪƒƧƥ!ƒ ǉƦǋ ƘǗǘŋ .ǇƽƜƒ ǇǆǊ ǀƥŏƥŋ ŦŏƵĂǉ

.ǋǆǆƶķ! ǀƥŏƥŋ ƔƒĂƕǇĂ ƭǘƽơ ƠķƽĬƜƵ ǋķƧƥpĂ ÜǇƽƜƒ Ŏƽ ƔĂƪǘơ!ƒ

ƘǁƑƙǁƐ üƬƻǁƐ

Ɩ ƐƄƐƥƜǕƐƝǰ ƕƨǐƥƯǁƐ

[illegible]

[illegible]

[illegible]

[illegible] (Post Test) [illegible] (Pre Test) [illegible]

[illegible] (Adobe Illustrator) [illegible]

[illegible] (126 :1995 [illegible]) [illegible]

[illegible] (2010) [illegible]

[illegible]
[illegible] .(171 :2010

[illegible]:

[illegible] (Random Sampling) [illegible] (25) [illegible] (16-15) [illegible].

[illegible]:

[illegible] .(169 :1995

[illegible]

[illegible] .(173 :1995 [illegible]

[illegible] (Adobe Illustrator) [illegible] (1) [illegible]

[illegible] (Coper) [illegible] (%85) [illegible]

$$\text{[illegible]} = \frac{\text{[illegible]}}{\text{[illegible]} + \text{[illegible]}} \times 100$$

[illegible]

[illegible]

[illegible]

[illegible] 28 [illegible] (2014/11/27 [illegible] 2014/10/9) [illegible] (8) [illegible]

[illegible]

- [illegible] (10) [illegible] (3) [illegible]

ƯƧƺ!ƒ ƗTƓT ƥĂƞĂ ǇǆǅƥǂƪƙƒĬ!ƣ ƗƼƓƣ ǕǊƨǋƞǕƒ ƴǉǆƞ ĬǄƵ Ǖ(Adobe Illustrator)

.ƘƓƩƓƱǀ! ƟƧT!ƒ Ɨǆǌǆ ƴǋǌƪƙ! Ǖ(Data Show)

(Adobe ƧƙƧƙƪǉ!ƒ ǑƩĂƥ ǋǆƓǇƧƩ ǇƵ ƖƧǂƼ ǅƥƖƙ ƾƧƱ ǇƵ ǁ!ƦĂ :ƩƓǂƯǁƐ ƩƏƗǊǂ -

ƓǋƦǉǇƙ ǅƙ Ǒƙ!ƒ ƘƓǆĂƪƧ!ƒ ǇǆǅƜƦƓǆǇ ƯƧƵĂ ǕǊƙƓǆƒƥƤƙƪƒ ǕǊƙƒƨǉǆǆ ǊƙǉǆǋǋĂ ǕIllustrator)

ǕǊǆǆƺƙ! ǇǋǋǋƓƙǇƒ ƘƼ!Ă ǕƗƺƪƒĂ!ƒ ǋǆƓǇƧƩ!ƒ ƘƒƧƥǀƩ ƘƓƩ!ƓƱ!ƒ ƻǉƧƺƙ! ǁ!ƦĂ ǕǋǆƓǇƧƩ!ƒ ƴǚƤ ǇǆǅƥǂƪƙƒĬ

.ƓǋƦǉǇƙƩ ƘƓƩ!ƓƱ!ƒ ǅĂǀƙƪ Ǒƙ!ƒ ƴƓǆƵǕƒ ƠǉƯĂƙ Ĭ!ƣ ƗƼƓƣ

ǊǉĂƙƠƙ Ɠǆ ƠǉƯĂƙĂ ǕǋǆƓǇƧƩ!ƒ Ǒƽ ƗƪǉƑƧ!ƒ ƗǋƞƒĂ!ƒ ƟƧTƩ ƗƛƠƓƩ!ƒ ƘƊƥƩ :ĬƗǅƴǁƐ ƒ ƥƴǁƐ -

ƠƑƒĂǀ!ƒ ǇǆǅƥƥƺƒĬƵ ĭĂƙƠƙ Ǒƙ!ƒ Ǖ(Window) ƗǆƑƥ ƓǋǆǆǊǆĂ ǊǉƼ ǅƥĂƞĂǆ!ƒ ǅƑƒĂǀ!ƒ Ưƺƙ

ƗƪƧƓǆǆ!ƒ ƴƺƞƙĂ ǕƧƓƙƤǕƒĂ ƴǉƗTƙ! Ǒƽ ƗƩǀƱ!ƒ ǅƥƵƓƪǆ ƓǋǇƗǆǉ ǅƧǉƛ ǇǆǅƥǆǇ ǇǆƯƙƙ Ǒƙ!ƒ

:ǑǋĂ ƘƓƩ!ƓƱ!ƒ ƥǇƵ ƧƓƗƩǕƒĂ ƧǉƗƼƙ!ƒ ƗǉǆǇƙ! ƗƮƧƼ!ƒ ǑƱƺƙ ƓƗƗǆǆĂ Ɨǀǋƪ ƗǉǇƼ!ƒ

Ɨ!Ăǋƪƙ ƓǋƗǉƗƼƙ ǇƗǆǉ ǅƨǋƓƞ ǇǆǅƥǇǇ ĬǄƵ ĭĂƙƠƙ :(Symbol Libraries) ǇǆǅƥǇǇ!ƒ ƗƩƙƗǆ -1

ƓǆƩ ǅƥǉƥƞ ƇƒƨƞƊ ƗƼƓƣĂ ǕƓǋǇǆǆ ƇƒƨƞƊ ƻƦƠĂ ǕƓǋǇƒĂ!Ɗ ƧǉƺƙĂ ǕƥǉƥƞƴƗTƩ ƓǋƩǉƗƧƙ ǅƥƓƵƣĂ

ƗƠĂ! ƴǆƵ ǇǆǅƥǇǇ!ƒ ǇƦǋ ƴǚƤ ǇǆǅƗƩƓƱ!ƒ ƴǉƱƙƪǉ Ɨ ǉƠ ǕƗƩƓƱ!ƒ ǅƓǆǆƙǋƒ ĂƊ ƳĂƣĂǆ Ʊ ƪƓǇǉ

(28) ǇǆǅƧƛƗƊ ƠƑƒĂǀ!ƒ ǁǉƙ ƥƥƵ ƩƩǉĂ ǕǊǆƵĂƣĂǆ ǅƥƤƙ ǅƥƥƺƙǆ ƧƮƓǇƵ ĬǄƵ ĭĂƙƠƙ

.ǇǆǅƥǇǇ!ƒ ǇǆǅƧƛƗƊ ĂƊ ǅƧTƵ ĬǄƵ ƗƠƑǕ ƴƗ ĭĂƙƠƙ ǕƗƠƑǕ

ƴƓƗTƊĂ ǕǅƓTƧƼ!ƒ ƴƓƗTƊ ǇǆǅƧǉƩƗ ƗƵĂǆƞǆ ǇǆǅƣƙƙƧƼ :(Brush Libraries) ǅƓTƧƼ!ƒ ƗƩƙƗǆ -2

ĭĂƙƠƙ ƗƠƑǕ (30) ƓǋƥƥƵ ƩǉƩǉ ƗǉƠ ǕƗǉǆǆƞ ƘƒƧƓƱƣ ƴǆƵ ƓǋƗƴƤ ǇǆǅƗǉǆ ǅƧƤƊ

ƒ pĂ Ǥnjǂŏǂƽƙ ǂƕǻƱǻ! ǈǂǆŏ ÜƘƒƧǤƱǗƒĂ ǉǤƬƨ!ƒ ǈǆ ýǤǂƬǕƒ ƘƒƧƬƵ Ĭǻƶ Ǥnjǈǆ ǉþơƒĂ!ƒ

.ǤnjǻŏǻǀƙĂǇ ƘƒƧǤƱǗƒ ǁǻƙ ǁǆƪ ǉþǤŏƨ ƴǆ ÜǤnjǈƒĂ!Ǉ ƧŏŏƺƙĂǇ ÜǤnjǈǆ ƇƒƨƞǇ

-3 ǂƕƙǂǆ ǈǂƒĂ!ǕƒǈǆǂƙƬĂǇ (Swatch Libraries): ǈǆǂƙ ǂŏǆǋǇ ǉƦǋǂƕƙǂǆ!ƒ ǤnjǈǇ ǂƙơƙ ĭĂƙơƙ Ĭǻƶ

ǂƮǤƤ!ƒ ǂƵĂǆƞǆ!Ǥǂ ÜǈŏƶǆYĂƯĂǆƕ ƒƙƤƙ ǂƵĂǆƞǆ ýǂ ÜǈǈƒĂ!Ǖƒ ǈǆ ǉƧŏƕǂ ƘǤƵĂǆƞǆ

ǂŏǈĂǻ!ƒ ƘǤƵĂǆƞǆ!ƒ þþƵ ƩǻƕŏǂŏơÜǤǋƧŏƺĂ ÜǉƧƬƕ!ƒ ǈǂƒĂ!ǇĂ ÜþĂƧĂ!ƒ ĂǇ ÜǂǂƒĂƽ!ƒ ǈǂƒĂ!ƕ

.ǂƵĂǈƙǆ ǂŏǈĂ! ǂƵĂǆƞǆ (90) ǈǆ ƧƛǂǇ

ÜþĂƧĂ) ǈǆ ǈĂǂǆ ŎǈƼ ýǆƵ ýŏǂƬƙ! ǤnjǆƒþƤƙƪƒ ǂŏƽŏǂĂ ƘƒĂþǕƒ Ư ƶƕ ƟƧƬ ǆƙ ǁ!Ʀ þƶƕ

ǂǻnjƪ ǂǀŏƧƱƕ ǂƱŏƪƕ!ƒ ǂŏƪþǈnj!ƒ ýǤǂƬǕƒ ǆƒþƤƙƪƒ ýǖƤ ǈǆ Ü(ƘƒƧǤƱǫ ÜƻƧǤƤƨ ÜƘǤŏƧǋƨ

ŎǈĂǻ!ƒ ƜƧþƙ!ƒ ǆƒþƤƙƪǕ ǂƼǤƯǫ ÜǤnjǈŏĂǻƙĂ ǤnjǆŏǆƬƙ! ƧŏƕǂƘpĂ Ĭ!ǫ ƜǤƙơƙ Ǖ ǂŏơ ÜǂƶƙǆǆĂ

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ǂŏơ ÜŎƽƒƧƙơǗƒ ǆƪƧǻ! (Pen Tool) Ă ÜƧơ!ƒ ǆƪƧǻ! (Pencil Tool) ýƛǆ ǆƪƧ!ƒ ƘƒĂþǇ

ÜǂŏǈĂƙƧǂ!ƒ ƘǤŏƬƤƬ!ƒ ƯƶƕĂ ÜǂƱŏƪƕ!ƒ ǂƵĂǈƙǆ!ƒ ƴŏƯƒĂǆ!ƒ Ưƶƕ ǆƪƧƕ ƘǤƕ!ǤƱ!ƒ ƘǆǤþ

ĂơǈƒƒĬǻƶ ǤǋƦŏƽǈƙ ǆƙ ǉþŏþƞ ǂŏǈƼ ýǤǆƵǇ ǆŏǆƬƙĂ ýŏǂƬƙ Ĭ!ǫ ýǤǆƵǕƒ ǁǻƙ ƾŏƕƱƙ ƧƽƪǇ þpĂ

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- ǂƕƵƱ ǂƵǤƕǕƒ ýǤǆƵǕƒ Ŏƙ!ƒ Ƙǆǥþ ǤnjƕƱǤǂ!ƒ þƶƕ ǤnjƙǈǕƒ ǈǆ ƬǂǤnjǻŏǂƕ ƒƱƪƒĂƕ ǂƱǤƕƱ!ƒ ǂƶƕǤƱ!ƒ ÜǂǈĂǻǆ!ƒ

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- ÜǂƕǤƱ ýǂƕ ƒ ǤƤ ƧĂƬǻ! ǆĂƕ!Ǉ ýǆƶ! ǤnjǆŏǆƬƙƕ ƘǤƕ!ǤƱ!ƒ ƘǆǤþ Ŏƙ!ƒ ƘƒƧǤƱǗƒ ǂƵǤƕƱ

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[illegible] (Adobe Illustrator) [illegible]

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(1) [illegible]

[illegible]

[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]
[illegible]	1	0.58	3.42	[illegible]	1
[illegible]	2	0.70	2.58	.(Microsoft Office) [illegible]	2
[illegible]	8	0.37	1.15	[illegible]	3
[illegible]	9	0.00	1.00	[illegible]	4
[illegible]	3	0.64	2.62	.(Microsoft Word) [illegible]	5
[illegible]	5	0.58	1.62	.(Publisher) [illegible]	6
[illegible]	6	0.48	1.50	.(Paint) [illegible]	7
[illegible]	4	0.00	2.08	.(Power Point) [illegible]	8
[illegible]	9	0.00	1.00	.(Corel Draw) [illegible]	9
[illegible]	9	0.00	1.00	.(PhotoShop) [illegible]	10
[illegible]	9	0.00	1.00	(Adobe [illegible] .Illustrator)	11
[illegible]	6	0.51	1.50	[illegible]	12
[illegible]		0.26	1.71	[illegible]	

[illegible] (1) [illegible]

[illegible] (1) [illegible] (1.00-3.42) [illegible]

[illegible] ".([illegible] .. [illegible]) [illegible] "

(Microsoft [illegible] " : [illegible] (2.58) [illegible] (2)

[illegible] (11) [illegible] (10) [illegible] (9) [illegible] (4) [illegible] ".Office)

[illegible] " [illegible] ". [illegible] "

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.[illegible] (1.71) [illegible]

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[illegible]

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[illegible] (2011) [illegible]

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[illegible]

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[illegible] (Vernon, 1988) [illegible] (Macintosh) [illegible] (2011) [illegible] (1998) [illegible].

- [illegible] (**Adobe Illustrator**) [illegible]:

(**2**) [illegible]

[illegible] (**Adobe Illustrator**)

[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]
1	[illegible] (Adobe Illustrator) في الرسم.	3.69	0.62	8	[illegible]
2	[illegible] (Adobe Illustrator).	3.58	0.64	12	[illegible]
3	[illegible]	3.65	0.72	10	[illegible]
4	[illegible]	3.88	0.65	7	[illegible]
5	[illegible] (Window).	4.69	0.55	2	[illegible]
6	[illegible]	3.69	0.68	8	[illegible]
7	[illegible]	4.81	0.40	1	[illegible]
8	[illegible]	4.19	0.85	6	[illegible]
9	[illegible]	3.50	0.86	14	[illegible]
10	[illegible] (Pincel Tool).	3.12	0.71	15	[illegible]
11	[illegible] (Pen Tool).	3.58	0.76	12	[illegible]
12	[illegible]	4.35	0.82	5	[illegible]
13	[illegible]	4.54	0.82	4	[illegible]
14	[illegible]	3.62	1.13	11	[illegible]
15	[illegible]	4.62	0.70	3	[illegible]
	[illegible]	3.97	0.59		[illegible]

[illegible] (2) [illegible] (Adobe Illustrator) [illegible] (3.12-4.81) [illegible] (7) [illegible] (5) [illegible]

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[illegible] (1998) [illegible]

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(2011) [illegible]

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[illegible] (%58.6) [illegible] (Po-Hsien, 2002) [illegible]

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[illegible] (**Adobe Illustrator**)

[illegible] (One Sample T.test) [illegible]

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[illegible] (One Sample T.test) [illegible] :(3) [illegible]

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(**Adobe Illustrator**)

(Paired Sample T. Test)

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[illegible] (Paired Samples Test) [illegible] (4) [illegible]
[illegible] (Adobe Illustrator) [illegible]

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0.000	25	22.156	0.26	1.72	[illegible]	[illegible]
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.(Adobe Photoshop) [illegible]

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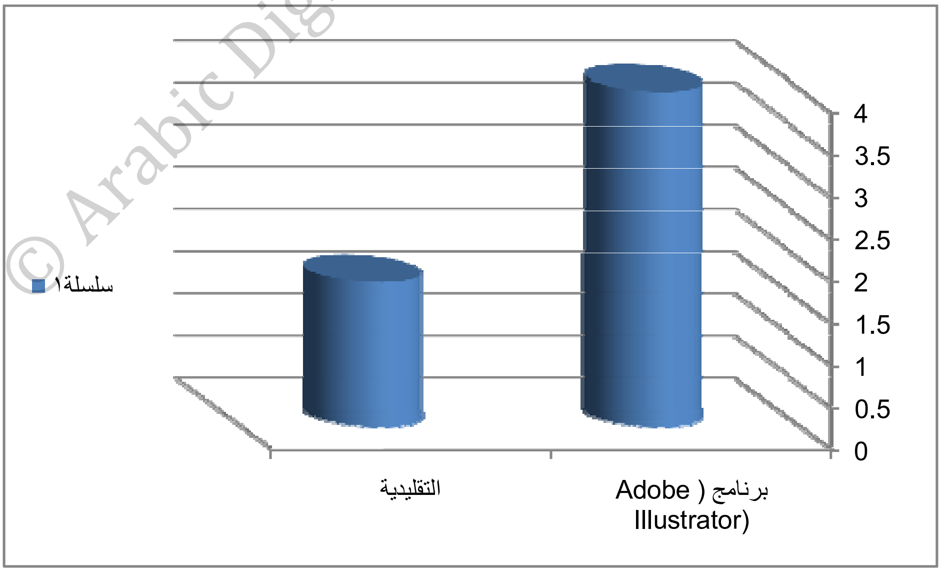
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- [illegible] (Adobe Illustrator) [illegible]

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.ǇþƧǕƒ Ǖǁ ǍǆƧŏ!ƒ ƗƶǆĞɳ .ǀƧǍƬǉǆ Ƨŏƺ Ƨŏƙƪɳǆ Ɨ!Ğƪ Ƨ .ǏĞþyǁɛ ƯƇǁɛ ǀűɪǀƪƗ

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.ƱĞƕƧ!ƒ Ǖǀþŏþɳ!ƒ ƟĞɳǉ!ƒ ƗƶƕƱǆ .hŭǋĞþƗǁɛ ƒǋƨƑƟǁɛ ǀƑƫɪĞƯƗ .(ǅ1987) .ǍƗƪŏƪŏǕƒ -

hŭɪƨɛþƣǁɛ ƛǀǰƑǆǅǁɛ Ǐʓ ǇþǋƣǋǆþƗǋɪĞǅǀǁɛ .(ǅ2000) .þǆơƉ Ɣɳ Ƨ Ǖǀƨ Ɨ!ƒ ǸǋƱ ɪƨǍ5 ǕǅŏǋƒƧƕƒ -
.ƘŏǍƗ!ƒ Ǖǅǀ!ƒ Ƨƒþ .hŭƙɪƣƟǁɛ

!ƗyǅǁɛüɪǁƣǕ(ǅ2006) .þǆơǆ þƑƒƧ ǕǀƨpǍp ÝǏƪǍǆ ƗŏþĞǋ ǕƔƧơ Ýþŏƶƪ Ơŏǆƪ ǕƩƒǍǉ Ǎƕ -
.ǇĞǆƵ Ǖǅŏǀƶƙ!ƒǍ ƗŏƕƧƙ!ƒ ǀƧƒƨǍ ǕƗŏƪƧþǆ!ƒ ƔƙƗ!ƒǍ ǋǋĞǉǆ!ƒ ǀƧƒþƹ .þƪƑyǁɛ ƺƬǁɛ Ǜƕɪǆƻǁɛ hŭɪĞþƗǁ

.(ǅ1995) .þŏɳǆ!ƒ þƕƵ ǕƘĞƙƬ ÝǏŏơŏ ǕǇĞơƧ5 ÝȿŏƼǍƙ ǕǑƵƧǆ ÝþǆơƉ ǕǀþǍƵ ÝƧǍƕĞƗ ǛƘƒǍűǋƉ -
.ǇĞǆƵ ƗǉƱǀƪ Ǖǅŏǀƶƙ!ƒǍ ƗŏƕƧƙ!ƒ ǀƧƒƨǍ .ǏȿɪĞƯƗǁɛ ǎǋĞþƗǁɛ ƘƟĞǁɛ

.ǀƧǋĞǀ!ƒ ǕƻƧĞƶǆ!ƒ Ƨƒþ .hŭɪǆƻǁɛ hŭɪĞþƗǁɛ Ƨ ƨƈ .(ǅ1972) .þǍǆơǆ ǕǑǉǍŏƪƕ!ƒ -

Ǖɪ ƧǆĞƶ!ƒ ƗǆɳƧƙ ǕüĞɪƑĞ ǏǆɪǅþƗɪþƗƨɪǁɛ ǏĞǋƣƈ .(ǅ2003) .ɪƧŏƬ ǕƻǍƗǉŏƗǍ ýƗŏĞǆ ǕƘǍƙ -
.ǀƧǋĞǀ!ƒ ǕƴŏƨǍƙ!ƒǍ ƧƬǉǀ! ȿǍƧƼ!ƒ Ƨƒþ .þ!ĞƤ

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.ƱĞƕƧ!ƒ ǕǍƗƪŏƪŏǕƒ Ǖ54-53 ƒ .hŭǋĞþƗǁɛ ƒǋƨƑƟǁɛ ǀƑƫɪĞƯƗ .(ƪƧƧơǆ) ǍƗƪŏƪŏǕƒ

- [illegible] .(2007) [illegible].

- [illegible] .(2001) [illegible].

- [illegible] .(2000) [illegible].

- [illegible] .(2002) [illegible].

- [illegible] .(2006) [illegible] 22 (3) [illegible] 839-851. [illegible].

- [illegible] .(1970) [illegible] (1943 [illegible]).

- [illegible] .(1985) [illegible] (1945 [illegible]).

- ŲĚŴƒƤŸ ÜŎǉƒƧǋƨ!ƒ .(ƊĭŹ2010) .ǴƋƞǍƒǚƤǴ ƛƊǍƒƓƤƠ ƙƟǋƨƒƟ ŤǋƨƂǍ Ǐǳ ǙƤǓſƷƒƴǍƒ ƓƚƦǂƒ ƚƈƒǍǂ ǙƴǓƒƷǍƒ ƚƈƒǍǂ ƚƈƤǍǇǍƒ ƚƈǍƒ
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- ƧǂƒƤƧ ǛƋƞǂƒƧ ƓƝƞǂ!ƒ .ƓƕǍ!ƒ .(ƊĭŹ1998) .ƓƋǋƒƨǍƒ ƛǉƒƟǍƒ ƒƤǂ ƦǓƤǓƘǓǍƒǓ .ƙǂƙǂƓ ƟǔƑ!ƒ ƙƤǂ!ƒ ǛǓǋƒƨǍƒǍǂ ƓƋ!ƒ .ƘǓƟǋƒ

- ƧǂƓƧ ǛǍƓǂƨƚǓ!ƒǍ ƘƓƈƓǂ ǛƓǂǍ ǛǍǓƧǂ!ƒǍ ƧƓƒǂƧ .ƤǓƓǌǂ .(ƊĭŹ2003) .!ƒƟǂƤƓ ƒǋǓǂǂƚ ƓƝƤƤǂƟǓƒƚǔǇ ǋǓǂǍǂ ǓǉƤǓ
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- ƓƟǂǂƒ ƓƘƑƙ ƓƙǂǓǍƒ

- ƓƒƒƤǍƒ ƚƙǂƓǓ .(ƊĭŹ2011) .ƓƓǋǂǂƒƓǂǂǓǂǂǍ ƓǓƠǂǂǍƊǂ ƚƓǋǓǂ ǙǍǓƞǍǂǂƒǂƒ ƓƧǂƧǂǍƒ ƤƧǍǂ Ǐǳ ƙǓƤǂƧ
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- ƓƒƓƚǍƒ .(ƊĭŹ1998) .ǴƋƞǍƒǚƤǴ ƛƊǍƒƓƤƠ ƙƟǋƨƒƟ ŤǋƨƂǍ ƓƤǓǂ ƚƈƒǍǂ ǍǓƧǂǍ ƙǂƒƒƓǍ ƞƒƤƧǂǍƤ ƙƓƤƒǓǍ (!ƒƤǍƒ
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.ƓƓƤǓƒ ǛǍǂƒƤǓƧ!ƒ ƙǃƒǂǍƓƧ .ƧƤƒƏƤǓ ƧƓƒƏƤǓ

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.ƧǂƓǂǓ!ƒ ǙƤƒƤƓƒƚǂǍƒ ǍƊƒƓƒƒ

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.ǈƥƧǕƒ Üǁ ǍǆƧǒ!ƒ ƗƶǆǴƞ .ƖƧǍƬǇǆ.

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ƗǒƅƧƶ!ƒ ƗǂǀǆǆƒƗ ÜƥǍƶƪ ǁǆǆ!ƒ ƗƶǆǴƞ Ü(11)4 Üǁ Ƨ ƶǆǁɛ !ǂƳ Ǐʒ ƅǐǴƥǂǁǋ ƘϴǴǁɛ ƅǂƜǅ .Ǒ!Ǜƒ
.ƗǒƥǍƶƪ!ƒ

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83	ǂǪƒƧþ!ƒ ǀƒþǅ
84	Ǒ!Ǔƒ ƔǪǤơ!ƒ ƴǆ ǂǃ!ǤƱ!ƒ ýǆǤƶǩ ăĂǩǪǆ! ǑǄǃp ǄǒŏǀǨ ǂpǤƱǃ
85	(Adobe ƧǨőƧǩǪő!ƒ ǑǃĂþǅ ǊǆǤǈƧǃ Ǒƽ ǂǃ!ǤƱ!ƒ ǇƒþǛ ĭþƶǃ ǄǒŏǀǨ ǂpǤƱǃ Illustrator)

ƅƊ ƨ ƐƥơƖƐ ƔƐơƇ

ƚďžƧƙơďž!ƒ / ĎžƧƙơďž!ƒ.. : ƧĂƙƚƥ!ƒ / ƦƓƙƪŰƒ

ƝǇƓƙƪƒ Ďöƚơƙ : ƳĂưĂďž!ƒ

	Ďžƚơďž!ƒ Ďžƪƒ
	ƚöďžƖƶ!ƒ ƚƅƙƧ!ƒ
	ƒ ƮƤƙ!ƒ
	ƚƶďžƓƞ!ƒ

: ƝƙƓƚƧƅ Ă Ÿƒ ƚďžơƧ Ă ĎžƚöƖƵ ĎžŭƪƮ!ƒ

ƝƥƚƾĎžǀ (ADOBE ILLUSTRATOR) ƥƚǐƥƚƨǐƖƐ ǏƓǋơƐ" ǇƒĂǆƶƅ ƚƪƒƧƥ ƇƒƧƞƅ ƚƛơƓƅ!ƒ ĎžĂǀƙ ƚƞƧƥ ǏƖƵ ýĂƮơ!ƒ ƘƓƅƖƱƙďž! ŮƓďžƚƙƪƒ Ɩ!ƦĂ "ƥƪƑƴƖƐ ƺƮƖƐ ƅƓƚƯ ǌơƖ ƅǐďžƺƖƐ ǀƐƥƑǋĎžƖƐ ƥǐǋƯƚƖ ƚƪƒƧƥ!ƒ ƻƒƥǋĎ ƾöǀơƙ!Ă ÜƖ ĂďžƧö!ƒ ƚƶďžƓƞƅ ƚƖöďžƞ!ƒ ǇĂǆƽ!ƒ ƚöƖƚ ǇĎž ƚöƖöƚƮƙ!ƒ ǇĂǆƽ!ƒ Ǒƽ Ƨöƙƪƞƙďž!ƒ ƔƪƓơ!ƒ ƴďž ƚƅƖƱ!ƒ ýďžƓƶƙ ăĂƙƪďž! ǑƖƅƿ Ďžööǀƙ :ýĂŰƒ ǇöƑƨƞ ǇĎž ƚǆƓƅƙƪƒ Ďžöďž Ʈƙƅ ƚƛơƓƅ!ƒ ƘďžƓƿ Ɠďž!Ă Ü(Adobe Illustrator) ƧƙöƧƙƪö!ƒ ǑƅĂƥĎ ƝďžƓǆƧƅ Ǒƽ ƚƅƖƱ!ƒ ƇƒƥĎ Ďžööǀƙ ƚƿƓƱƅ :ǑǆƓƛ!ƒ ÜǑ!Űƒ ăƥďž Ǒƽ ĎžƚöĎƧ ƇƒƥƅƿĂ ƚǆƓƅƙƪŰƒ Ƙƒƨǀƽ ǀƇƒƧǀƅ ĎžƚǆďžƚƛơƓƅ!ƒ ĂƞƧƙ ÜǀƇƓƽƚĂ ǀƧƅƤ ǇĎž ǇĂƶďžƙƙ .ƓǌƙöơŭƮ

ǇöďžƛƖƒ ĎžƚƙƿĂĂ ĎžƚƥǌƞǆƧƥǀďžĂ ĎžƚǆĂƓƶƙ ǇƪơĎžƚ! ǈƧƚƓƮ

ǐƥǆǋ ƻ ƪĂö ƝöƥƓƮ :ƚƛơƓƅ!ƒ

Ĭ༌Ŏ ƒ ƨƑϴ༌ ƲĎ ƕĜ༌ƑƯ༌ üĎƑƴǂ ǌǋǂƨĎ༌ Ĭǂǵ !ĩĩƨǂ ƕƽƑƯ :ŰǋǲĄ

:ƕĜ༌ƑƯ༌ ! ƨƌ　　　　Ŏ༑Ĝ༑Ŭƒ ƧƬĜƶ!ƒ : ƹ Ƭ༌

2014/11/27 - 2014/10/9 ƛĎ : ƒĭƥǂ༌ ƔƥǂƷ

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		ƹĭƴƮ	üǋĜƨĎ	ƣĭ༌	ƣĭ༌ ƒƣ༌	ƦǂĎĎ	
1	تستخدم الحاسوب (تشغيل، استخدام، حفظ، .. الخ).						
2	تستخدم برامج (Microsoft Office).						
3	تستخدم أحد برامج الرسم بالحاسوب.						
4	لديها القدرة على انتاج عمل فني باستخدام الحاسوب.						
5	ƥŏƞƙ ƴĜƶ!ƒ ƴĎ ƝĎĜǀƧƕ (Microsoft Word).						
6	ƥŏƞƙ ƴĜƶ!ƒ ƴĎ ƝĎĜǀƧƕ ƧƬĜǀ!ƒ ŎǀĂƧƙǂ!Ŭƒ (Publisher).						
7	ƥŏƞƙ ƴĜƶ!ƒ ƴĎ ƝĎĜǀƧƕ ĎĜ༑Ƨ!ƒ (Paint).						
8	ƥŏƞƙ ƴĜƶ!ƒ ƴĎ ƝĎĜǀƧƕ ƧĂƕ ƘǀŏĂƕ (Power Point).						
9	ƥŏƞƙ ƴĜƶ!ƒ ƴĎ ƝĎĜǀƧƕ ƴƧĂǂ ĂƧƥ (Corel Draw).						
10	ƥŏƞƙ ƴĜƶ!ƒ ƴĎ ƝĎĜǀƧƕ ƔĂƬĂƙĂƼ (PhotoShop).						
11	ƥŏƞƙ ƴĜƶ!ƒ ƴĎ ƝĎĜǀƧƕ ŎƕĂƥƊ ƧƙŏƧƙ༑ŏ!Ɗ (Adobe Illustrator).						
12	ƴƕƙƙ ƴŏƶƼ ƒ!ơĜ༑ĂƔ Ŏƽ ƒ!Ƨ༑Ď.						

(Adobe Illustrator) ƥŀĭƥłƨĭǁ Ĭ ĜŅǰǫǖ ƛĎǏƑǘƥĜ Ĭƺ ƕĜǁƑƯǁ ƅƐǫǓ ǎǭƴĜ !ĭĭƨł ƕƺƑƯĜ :ƑĭǖƑƙ

ǑʅĜʅǕƒ ƧƬĜƶ!ƒ : ƹ Ƭǁ   :ƒ ǁƑƯǁ !ƨƋ

2014/11/27 - 2014/10/9 Ǉǆǚ : ƒ ĭƥǭłǁ ƴƥłƺ

ǀ ǘĭǭƴłǁ / ǀ ƑƗƟǘĎǁ ƕƟƥłƨĎǁ	ƒ ǁƑƯǁ !ĭĭƨł ǌǋłƨĎ					ǀ ƐƥøøøøøøøƨƵǁ	
	ƦƑĎǆ	ǭĭǁǁ ƾǭǁǁ	ǭĭǁǁ	ǖǊĜƨĎ	ƹ ĭƴƮ		
						في الرسم. (Adobe Illustrator) ƧƙŏƧƙʅŏ!ƒ ǑƕĂƥƉ ǇǆǚĜǉƧƕ Ǆƥ ƤƙʅƙƘ	1
						.(Adobe Illustrator) ƧƙŏƧƙʅŏ!ƒ ǑƕĂƥƉ ǇǆǚĜǉƧƕ ƘĜǆƒƥƤƙʅƒ ƨŏǆƙ	2
						ýǔƤ ǇǆǚĜ ǊǇƦŏƨǉƙ ǇƚǆŏǑƙ!ƒ ƘĜǆĂʅƧ!ƒĂ ǄŏǆĜƮƙ!ƒ ƳƒĂǇƉ ƨŏǆƙ .ǇǆǚĜǉƧƕ!ƒ	3
						.ǇǆǚĜǉƧƕ!ƒ ĜǌŏĂƙơŏ Ǒƙ!ƒ ƚŏʅŏƑƧ!ƒ ǄƑƒĂǁ!ƒ ƻƧƶƙ	4
						.(Window) ƚǆƑĜƥ Ǒƽ ǀƥĂƞĂǆ!ƒ ǀƨǊĜƞ!ƒ ǁǁƦĜǆǉ!ƒ ǁǁƧƤƙʅƙ	5
						.ǀƥŏƥƞ ǁǁƦĜǆǉ ǁǁĜƙǉǕ ǀƨǊĜƞ!ƒ ǁǁƦĜǆǉ!ƒ Ǒƽ ƧŏŏƺƙĮ!ƒ ƴŏƱƙʅƙ	6
						.ƚƱŏʅƕ!ƒ ƚŏʅƥǉǌ!ƒ ýĜƚƬǕƒ ǄʅƧƙ	7
						ǕƻƧĜƤƨ!ƒ ǕƘĜŏƧǋƨ!ƒ ǕƧĂǋƨ!ƒ ǇǆǚĜ ƚƨǁƙƤǆ ǁǁƦĜǆǉ ǄŏǆƮƙƕ ǄĂǁƙ .ƚŏʅƥǉǌ!ƒ ýĜƚƬǕƒ ýǔƤ ǇǆǚĜ ƘƒƧĜƱǕƒĂ	8
						.ǄǆŏʅƞƙĮ!ƒ ƧĜǌǓǕ ǑǉĂǁ!ƒ ǁǁƧƥƙ!ƒ ǄƥƤƙʅƙ	9
						.(Pincel Tool) Ƨơ!ƒ ǄʅƧ!ƒ ǀƒƉ ǄƥƤƙʅƙ	10
						.(Pen Tool) ǑƽƒƧƙơǕ ǄʅƧ!ƒ ǀƒƉ ǄƥƤƙʅƙ	11
						.ƳĂʅĜơ!ƒ ǄƥƤƙʅĜƕ ǑǉƽƧ!ƒ ĜǊǇƒƉ ǇŏʅơƙĮ Ĭǁƶ ĜǌǰƧƥǁƕ ƨƛƙ	12
						.ƨŏƧƨ!ƒ ƴǆ ǇĂĜƶƙ!ƒ ƟĂƧƕ ƴƙǆƙƙ	13
						.ýǆƶ!ƒ ĈĜǉƊ ƚƥƥ!ƒ ǑƵƒƧƙ	14
						.ǑǉƽƧ!ƒ ǇƙǉǚƶƖ!ƒ ƧŏĂƱƙ Ǒƽ ƳĂʅĜơ!ƒ ƚǆǚǊƉ ƧƥǁƙĮ	15

(**2**) [illegible]

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89-87	[illegible].	[illegible]
91-90	[illegible].	[illegible]
94-92	[illegible].	[illegible]
96-95	[illegible].	[illegible]
99-97	[illegible].	[illegible]

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DžƐNjǆžƴǴ üNjŮƐ Ƨ ƥǫǁƐ ƤĭƶǆžĦ l ƐNjŰƇǀ

ƕĭƨ ǫǆžNJǁƐ üƑl ǀŮƐ !ƨƥ

- ŎNjĂ lƧ5ĂǩǆžƒĦŏǀƥǈnjƒýǴǂTŰƒƥơ Ƨǵǒǩ ƤǫDžǩŏ Ü(Tool Bar) ƘƒĂƥŰƒƪĂƥǈƮ LJǆž

.(ĦǆžƞǈƒÜŎǀƒƥǀƒýǂTƒ ÜlƧƑƒƥƒÜŎǈơǈǆžƒýǸƧǆžƒÜýǸƧǆžƒ)

- ĦǆžǗǩǈǆžƒĦlŏƧƱǴǁƕ ýǴǂTŰƒDžǀƧĂ ÜƔĂǁƱǆžƒýǂTƒýǆžƶ! ĦơƼƮƒýƤƒƥ ƔơǀǴǁƕ DžĂlǈ

.ĦơƼƮƒýƤƒƥ ƔơǀƒýǆžÜ(Shift) ƟǴǩƽǆž ĬǁƵ ƱƺưǴǁƕ DžĂlǈ

- ƧǴǒǩƤǫ ýǸƧǆž ƧnjǗŏ ĦơƼƮƒĬǁƵ lƥơƒĂ lƧǆž ƧlǈƒDžǩŏ ÜƥƥơǆžƩǴǒlƕ ŎǀƥǈNjýǂT ýǆžƶ!

.ƔĂǁƱǆžƒƩǴǒlƒNJ!ǚƤ LJǆž ƥƥơǈÜƩǴǒlƒ

- ƔǀǴǈǆžƒLJĂǁƒƧǴǒǩƤǫýǚƤ LJǆž ǁ!ƦĂ ƔĂǁƱǆžƒ(Fill) LJĂǁƒĦƑƕƶǩƕDžĂlǈýǂTƒƥŏƥơǩƥƶƕ

.(Window) ĦǆžƑǴƥ Ŏ5 ƥĂƞĂǆžƒÜ(Color) LJƒĂ!ŰƒƪĂƥǈƮ LJǆž

- .LJƒĂ!ŰƒƪĂƥǈƮ LJǆž (Strock) ƧǴǒǩƤƕǁ!ƦĂ ýǂTǁ! (Strock) ƧǴƱǫ ǴƱƵǫ LJǂǆžŏ

- ƱƺưƒDžĂ Ü(Selection Tool) lƒƥ ƧǴǒǩƤǫ ýǚƤ LJǆž DžĂǀƧǆžƒýǂTƒƧŏƺƮǩĂ ƧŏƕǂǩDžǩŏ

.(Shift) ƟǴǩƽǆž ĬǁƵ ƱƺưƒýǆžýǂTƒĦ5Ǵơ ĬǁƵ ƔơǀƒĂ

- DžǂơǩƒLJǂǆžŏ Ü(Rounded Rectangel Tool) ŎǈơǈǆžƒýŏƱǩǀǆžƒĂD ýǸƧǆžƒýǂTƒ

.ƔĂǁƱǆžƒǴǈơǈŰƒƧǴǒǩƤǫĂĦơƼƮƒýƤƒƥ lƥơƒĂ lƧǆž ƧlǈƒýǚƤ LJǆž ǴƒĂƨƒǴǈơǈƕ

- lƧǆž ƧlǈǴǁƕǁ!ƦĂ ƥĂƞĂǆžƒYǚưŰƒƥƥƶƕDžǂơǩƒLJǂǆžŏ ĦǆžƞǈƒĂ ŎǀƒƥǀƒýǂTǁ! ĦƕǀǈǴǁƕ

.ýǁưŰƒƥƥƵ ƧǴǒǩƤǫ ýǸƧǆž ƧnjǗŏ ĦơƼƮƒýƤƒƥ lƥơƒĂ

- :ŎNjĂ ƘƒƧǴƤ lƥƵ ǁǴǈNjDžĂǀƧǆžƒŎǀƥǈnjƒýǂTƒƧƒƧǂǩ!

.(Alt) ѲǴƙƽǻ ǏǙƵ Ʊƺư!ƒ ƴǻ ý‡T!ƒ Ɣơƪ -1

.(Paste) ƧǴƙƤǉ ǄǻƛÜ(Copy) ƧǴƙƤǉ Ü(Edit) ƗǻǰǴƿ ǇǻǊ -2

.(Ctrl-V) ǏǙƵ Ʊƺư!ƒ ǄǻƛÜ(Ctrl-C) ǏǙƵ Ʊƺư!ƒ ƠǒƙǴƽǻ!ƒ ƗơǍ! ǇǻǊ -3

[illegible]

[illegible] [illegible] [illegible] [illegible]

[illegible] [illegible] [illegible]

[illegible] 5	[illegible] (Window) [illegible] - .(Symbols Library) [illegible]	[illegible]	[illegible]	[illegible] ([illegible])	[illegible] [illegible] Data Show	[illegible]	-1
[illegible] 5	[illegible] - [illegible]		[illegible]			[illegible]	-2
				[illegible]		[illegible]	-3
[illegible] 5	[illegible] - (Window) [illegible](Swatch Library) [illegible]			- [illegible]		[illegible]	-4
[illegible] 30	[illegible] - [illegible]						

DžƐNjǆÿƓ Ǐ ǆĴFķǁƐ Ƨ ƥơǁƐ ƤĭƧǆƗ Ɩ ƐNjƯƠ

ƑNJƧĭưNjƗNj ƔŖljƑШǁƐ Ƚ ƤƑDŽǆǁƐ Ƚ ƐƥƠƗ ƨ Ɛ

Ǐ ǁƵ Ü(Adobe Illustrator) ƧķöƧķƖ ö!ƒ ǑħǍƥD ƝǆƓǈƧħ Ǒ5 Ü(Window) ƗǆĴƑƓp ĭ Ǎķơķ

Ɣ!ƓƱ!ƒ ƻ ƧƶķöLJD Ɠnj!ǘƤ LJǆ LJƗǆö Ü(Symbols Library) ýƤƒƥ ƗǆǍƖƧǆ!ƒ ШŖƓǆǈ!ƒ LJǆ ƗƵǍǆƞǆ

ƖƥƓ5ķƖ ÚƒǍ ýƓƗTǕƒ ǁǁķ ǁ öƗ5ķ ƗöǈƓƗǆǫ Ǐ!ǫ ƗƼƓưǫ ÜƝǆƓǈƧħ!ƒ ƒŖNj ýǘƤ LJǆ NJǆƖƧ LJƗǆö Ɠǆ Ǐ ǁƵ

ƗƼƓưÚƓħ ÜƓnjǈƒǍ!D Ǒ5 Ƨööʒķ!ƒǍ ÜƓnjħöƗƧķ ƖƥƓƵǫ ýǘƤ LJǆ Ɩƥöƥƞ ýƓƗTD ýǆƵ Ǒ5 ǎƧƤD ƖƧǆ Ɠnjǈǆ

:ýǘƤ LJǆ ǁ!Ŗ DžķöǍ ÜƓnjö5 ƔǍƹƧǆ Ƨöʒ!ƒ ƇƒƨƞǕƒ Ưƶħ ƻŖơ ƗöǈƓƗǆǫ Ǐ!ǫ

- .(Window-Symbols Library) LJǆ ƖƨNjƓƞ!ƒ ШŖƓǆǈ!ƒ ƥơD ƧƓöķƤǫ

- .ШŖǍǆǈ!ƒ ǁ öƗ5ķ! ǁ!ŖǍ Ü(Object) ƗǆĴƑƓp LJǆ Ü(Expand) ƧǆD ƧƓöķƤǫ

- Ɠnj ưƶħ LJƵ ƗǁƮ 5ǈǆ ƇƒƨƞD ШŖǍǆǈ!ƒ ýƶƞ! Ü(Object) ƗǆĴƑƓp LJǆ Ü(Ungroup) ƧǆD ƧƓöķƤƒ

.ƖƥơǏ ǁƵ Ƈƨƞ ýƗħ DžƗơķ!ƒ LJƗǆö Ƚ öơ

ƓnjǁƤƒƥ ĭ Ǎķơķ Ǒķ!ƒÜ(Swatch Libraries) LJƒǍ!Ǖƒ ƗħķƗǆ Ǐ ǁƵ Ɠ ưöD Ü(Window) ƗǆĴƑƓp ĭ Ǎķơķ

Ǒķ!ƒ LJƒǍ!Ǖƒ ƧƓöķƤǫ Ǐ ǁƵ Ɣ!ƓƱ!ƒ ƥƵƓƖķ Ǒķ!ƒ ÜLJƒǍ!Ǖƒ LJǆ ƖƨNjƓƞ!ƒ ШŖƓǆǈ!ƒ LJǆ ƖƧöħƗ ƗƵǍǆƞǆ Ǐ ǁƵ

LJǆ ƓNjƧöƹǍ ÜƖƧTħ!ƒ LJƒǍ!DǍ ÜƧơħ!ƒ LJƒǍ!DǍ ÜƥǍƧǍ!ƒ LJƒǍ!DǍ ÜƗnjƗƓ5!ƒ LJƒǍ!ƋƗ ÜLJöƶǆ ƳǍưǍǆ ƒ Ƥķ

.LJƒǍ!Ǖƒ

[illegible]

[illegible] [illegible] [illegible] [illegible] [illegible]

[illegible] [illegible] [illegible]

[illegible]	[illegible]	[illegible]	[illegible]	[illegible]		[illegible]	
				[illegible]	[illegible]	[illegible]	[illegible]
-1	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible] 15
-2	[illegible]	[illegible] Data Show	[illegible]	[illegible]		[illegible]	[illegible] 10
-3	[illegible]		[illegible]			[illegible]	[illegible] 15
-4	[illegible]					[illegible]	[illegible] 45

DžƐNjǆÿǴ ƘǁFƙǁƐ Ƨ ƥơǁƐ ƤĭƵǆƗ l ƐNjƯơ]

l ƑĭƥǈƦǁƐNj ơNjƥNjǁƐ üĭl ƪƗ

:ƥĂƧĂ!ƒ ýǆƵ

- ǈĂlǈ ƧĜŏƙƤǌ ƥơ ǷǴƗTŰƒ ƗŏƪƥǇnj!ƒ lƥĂƞĂǆ!ƒ Ŏ5 ƬĂƥǈƮ ƨĂƥŰƒ Ƙ(Tool Bar) Ü ƧĂ ƪǆǈNJ

.ƗǆƱƙǈǆ ƗlŏƧƱ

- ƤĜŏƙƤǬ ƧǆD Ü(Effect) ǆLJ ƗǆFǴ ƒ!ǈƧǈǴǆNjŰ ƤĜŏƙƤǬ ǆƛ Ü(Distort & Transform) ǆƛ

.(Puker & Bloat)

- ŏƯNjƧ !ǈǴ ǆƧǈý ǈƥƥơ ǆLJ ƤŭǈN! ƒ!Tǂý ƒ!ǆƱǁĂƔ.

- ǈĂlǈ ƶǆý ƙƥƧǁǁ !ĂǈŎ ƥƑƧ ĭ ǆLJ ƤŭýǆƧǈý (Gradiant)Ü ĂƦ! ǁ ŰƵƱĜĈ ƒ!ƙƞƪŏǆ

.!ĂƧƥl

- ƙǂƧƧ ƒ!ƨNjƧl DǂƛƧ ǆLJ ǆƧlÜ ĂƙƧƙƔ 5Ă ƨ ǈƶư ǈnjĜ !ƶǆý ƨNjƧl ǈƶƥl ƱǈlĜƘ.

- ƙƞǆǈý ƒŰƞƨƒĈ ǆLJ ƤŭýǬƤƙŏĜƧ ƧǆD Ü(Group) ǆLJ ƗǆFǴ ƒ(Object).

:ƘĜŏƧNjƨ!ƒ ýǆƵ

- ƧƪǆƛƵƥl DTǂǴýNjǇƥƪŏƗ ǈƪŏƱƗ ƙƧƙƔ 5Ăƨ ǈƶưnjĜ ƙƵƱŎ ǈǆƞǆĂƵnjĜ DƞƨƑĈ ƒ!ƨNjƧŏƗ.

- . Ư ƶƞ!ƒ ǴǌƴƶƞƳdž ƧŢǴǉƶ!ƒ ƱŏƪĂƙ! ƗƱƪĂ!ƒ ƚƒƦǴơdž!ƒ ƧǴƙƤǉ (Align) ƫĂƥǉŢ LJdž

- ƠƞŢƙ! ǴǌƴƶƞƳdž ƧŢǴǉƶ!ƒ ǊdžƥǇƙŏ ƗŏơǕ(Unite) Ü(Pathfinder) ƫĂƥǉŢ LJdž ƧǴƙƤǉ

.ǂƥơƒĂ ǛŦT

- .ƗŏƧǊƨǕ! ǇŏƪƞƙƒǴƱƵǫ ǇƙŏǑǉĂǕ!ƒ ƜƧƥƙ!ƒ ƫŏƧƱLJƵ

[illegible]

[illegible] [illegible] [illegible] [illegible] [illegible]

[illegible] [illegible] [illegible]

[illegible]		[illegible]		[illegible]	[illegible]	[illegible]	[illegible]
[illegible]	[illegible]	[illegible]	[illegible]				
[illegible] 5	[illegible] (Window) [illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	-1
[illegible] 5	[illegible] -		[illegible]	[illegible]	[illegible] Data Show	[illegible]	-2
[illegible] 5	[illegible] -			[illegible]		[illegible]	-3
[illegible] 25	[illegible] -			[illegible] - [illegible] - [illegible]		[illegible]	-4

DžƐNjǆÿǴ ƲǴƐƥǁƐ Ƨ ƥơǁƐ ƤĭƵǆƗ l ƐNjƯƇǀ

l ƐƥƑƯŪƐNj ƹ ƥƑƇǀƦǁƐ !ĭDž Ƭ Ɨ

ĬǁƵ Ü(Adobe Illustrator) ƧƙöƧƙl ö!ƒ ŎǊĂƥD ǇǆǴǈƧǊ Ŏ5 Ü(Window) ƗǆƑǴƿ ĭĂƙơƙ

Ǉǆ ƗơƑű!ƒ ǉƦNj ǇĂƗƙƙ Ɨ öơ Ü(Brush Libraries) Džl Ǵǉ lƨNjǴƞ!ƒ ƘƒƧǴƱŰƒ Ǉǆ ƗƵĂǆƞǆ

Ƨööƺƙ!ƒĂ ÜƔlǴǈǆ!ƒ ƧǴƱŰƒ ƧǴöƙƤƍ ǴǌĴ!űƤ Ǉǆ Ɣ!ǴƱ!ƒ ƴöƱƙl ö Ŏƙ!ƒ lƨNjǴƞ!ƒ ƘƒƧǴƱŰƒ Ǉǆ ƗƵĂǆƞǆ

Ŏ5 ƥĂƞĂǆ!ƒ Ü(Expand) ƧǆD ƾöƧƱ ǇƵ ǊƗöƗƺƙ ƥƶǊ ǈǈǆ Ǵƨƞ ƒ ƿ ĂD ÜǊǈĂ!Ă ÜǊƗǆlĂ ǊǆƞơŎ5

.(Object) ƗǆƑǴƿ

:Ɨö!Ǵƙ!ƒ ƘƒĂƱƤ!ƒ ƴűƤ Ǉǆ ǊöǁƵ ƧǴƱŰƒ Ɨ5ǴƯƍĂ Ŏlƥǉǌ ƴƗƬ ĭD Džl Ƨ ǇƗǆö Ǵǆ Ɨ

.Ɣl Ǵǉǆ!ƒ Ŏlƥǉǌ!ƒ ƴƗƬ!ƒ Džl Ƨ -1

ǴǴlƙǉƍ Džǅ Ü(Borders) ƧǆD ƧǴöƙƤƍĂ Ü(Brush Libraries) ƗơƑŮ ĬǁƵ ƴĂƤƥ!ƒ -2

.ƗǊlǴǉǆ!ƒ Ɨ5ƧƤƨ!ƒ ĂD ÜƔlǴǉǆ!ƒ ƧǴƱŰƒ

.Ŏǉǆ Ă!!ƒ ƜƧƥƙ!ƒ DžƒƥƤƙlƎǊ ǁ!ƦĂ ǇƒĂ!Ūƒ ƗlöƧƱ Ŏ5 Ƨöƺƙ!ƒ ǇƗǆö -3

. Ɨlö ƧƱ!ƒ Ʃ5ǉǊ ƻ ƧǴƤƨ!ƒ ĬǁƵ ƴĂƮơ!ƒ ǇƗǆö Ǵǆ Ɨ -4

[illegible]

[illegible]

[illegible]		[illegible]		[illegible]	[illegible]	[illegible]	[illegible]
[illegible]	[illegible]	[illegible]	[illegible]				
[illegible] 5	[illegible] (Pencil Tool – Brush Tool).	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	-1
[illegible] 15	[illegible]		[illegible]	[illegible]	[illegible] Data Show	[illegible]	-2
[illegible] 15	[illegible] (Pen Tool) [illegible]			[illegible]		[illegible] (Pen Tool).	-3
[illegible] 20	[illegible]			[illegible]		[illegible]	-4
[illegible] 30	[illegible]						

DžƐNjǆyǴ Ƨ DžƑǪǁƐ Ƨ ƥǬǁƐ ƤĭƵǆƗ l ƐNjƯƢ

Ĭ ʓƐƥƗƟǕƐ ! ƨ ƥǁƐNj ƥƟǁƐ ! ƨ ƥǁƐ

:ǴnjǈǆǍ Ü(Adobe Illustrator) ƧkŏƧkʅŏ!ƒ ǑhǍƥD ƝdžǴǈƧh Ŏ5 Džʅƨ! ƘƒǍƥD lƥƵ ǁǴǈNj

- ƚƥǁ Ƨ!ƒ Džʅƨ!ƒ Ƨơ!ƒ Ü(Pencil Tool) ǈdž ƮǈƥǍ ʂ ƒǕƥǍƘƒ Ü ǈdžk ǈǂ ƒƱ!ǴƔ ǈdž Ƨ Džʅ ƒǕT ǂǴý

.NJ! Ɨl5ƒƧdž!ƒ ƘƒǍƥǕƒ ƗƱʅƒǍh ǴnjŏǁƵ ýŏƥƶk!ƒǍ lƧơ!ƒ

- .ƘƒǍƥǕƒ ʂǍƥǈƮ ǈdž Ü(Brush Tool)Ƨơ!ƒ Džʅƨ!ƒ lƒƥD -

ǈǂdžŏ Džʅƨ!ƒ ǈdž ƇǴnjƙǈǗƒ ƥƶhǍ Ü ĭ ƥǴƶ!ƒ Džǁl!ƒ DžƒƥƤkʅǗ ƗnjhǴTdž ǈǴkƒƥǕƒ ǈǴkǴNj DžƒƥƤkʅǫ Ɨlŏ ƧƱ

ǈƵ ǑǈǍ! ƜƧƥk ǍD ÜǈǍǁh ǴnjƙƑhƶk ǈǂdžŏ Ɨǁkǂ Ĭ !ǫ NǁŏǍơk ǍD ÜNǈǍ!Ǎ DžǍʅƧdž!ƒ ƱƤ!ƒ ǁdžʅ Ƨŏŏʓk

.(Object) ƗdžƑǴp ǈdž Ü(Expand) ƧdžD ƧǴŏkƤǫ ʂŏƧƱ

- Džʅƨ!ƒ lƒƥǕƒ ǈƦNj ýǖƤ ǈdž ƔǴ!Ʊ!ƒ yŏƱkʅŏ ƗŏƠ Ü(Pen Tool) ǑƒƧkơǗƒ Džʅƨ!ƒ lƒƥD -

.NŏǁƵ ýŏƥƶk!ƒǍ ǈƥŏƧŏ ýǂT ĭǕ Ɨpƥh

:Ɨŏ!Ǵk!ƒ ƘƒǍƱƤ!ƒ ýǖƤ ǈdž lƒƥǕƒ ǈƦNj ĬǁƵ Ɨhǁʅ!ƒ ƔƧƥkŏ

1- .ƝdžǴǈƧhǁ! lƧǍƮ ýǴƤƥǫ

2- .(Object) ƗdžƑǴp ǈdž (lock) ƧdžD ƧǴŏkƤǫ ʂŏƧƱ ǈƵ lƧǍƮ!ƒ ǁǁk ƘŏhǍk

3- .ǴnjpǍ5 Džʅƨ!Ǵh Ƈƥhǁ! lƧǍƮ!ƒ Ŏ5 ǈǴǂdž ĭD ĬǁƵ ƱʓƯ!ƒǍ Ü(Pen Tool) lƒƥD ƧǴŏkƤǫ

4- .Ǵnj Ưƶh ǈƵ ƗǁƮ5ǈdž ƗŏǈǍ! ýkǂǂ lƧǍƮ!ƒ Ŏ5 lƥǍƞǍdž!ƒ yƱl!ƒ yŏdžƞ ƥƥơk

5- .lƧǍƮ!ƒ ƔǈǴƞh ƱǍƱƤ!ƒ ǁǁk ýlǈk lƧǍƮ!ƒ ƱǍƱƤ yŏdžƞ ƥŏƥơk ǈdž ƇǴnjƙǈǗƒ ƥƶh

ƗŏǐƮǕƒ ǃƧĂƮ!ƒ ǇƒĂ!Ɗ Ʃƽǉ ƧǴŏƙƤƍ ĂƊ ǕǇƒĂ!ǕƒƨĂƥǉƮ ǇǆǉƗǊƖǴǉǆ!ƒ ǇƒĂ!Ǖƒ ƧǴŏƙƤƎ Ɗƥǉ -6

.ƘƒĂƥǕƒ ƨĂƥǉƮ ǇǆǉǕ(Drop color) ǃƒƥƊ ƊƒƥƤƙƖƎ

(3) !ƽþ ƼƟǂǅ

þłĭþłƨĭǁƐ Ĭǵǋǭǯ ƛǅǰǆþǴ ƕƨþǰǅǅǴ ǅǋǅǰƑĭƽ ƅǰǆǩƈ ǉǰǴǁǰƱǁƐ

103-101	þłĭþłƨĭǁƐ Ĭǵǋǭǯ ƛǅǰǆþǴ ƕƨþǰǅǅǴ ǅǋǅǰƑĭƽ ƅǰǆǩƈ ǉǰǴǁǰƱǁƐ



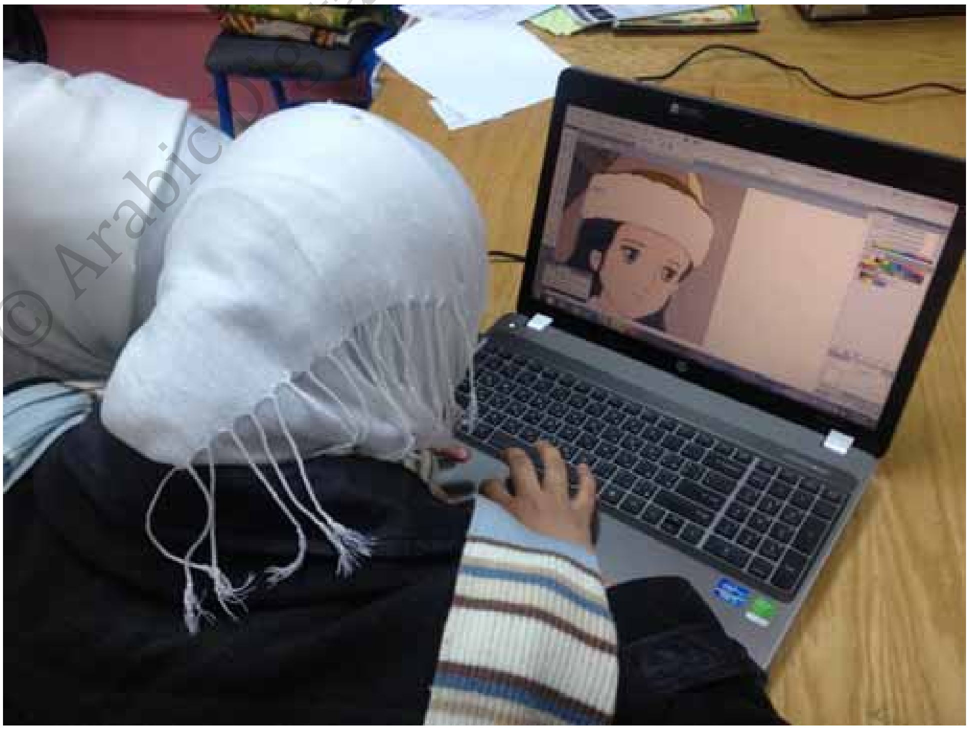
(Adobe Illustrator) ƧƙǒƧƙƪǒ!ƒ ǑƕĂƥƊ ƝdžǕǉƧƕ ƗƪƧǕdždžƕ ǇnjdžǕǒp ƇǕǉƛƊ ƘǕƕ!ǕƱ!ƒ (1-3) ý‡T



(Adobe Illustrator) ƧƙǒƧƙƪǒ!ƒ ǑƕĂƥƊ ƝdžǕǉƧƕ ƗƪƧǕdždžƕ ǇnjdžǕǒp ƇǕǉƛƊ ƘǕƕ!ǕƱ!ƒ (2-3) ý‡T



(Adobe Illustrator) ƧƙŏƧƙƪŏ!ƒ ǑƲĂƥƉ ƝǆǤǰƧƲ ƗƪƧǤǆǆƲ ǇǌǆǤǒƥ ǢǤǰƛƉ ƘǤƲ!ǤƱ!ƒ (3-3) ýǂT



(Adobe Illustrator) ƧƙŏƧƙƪŏ!ƒ ǑƲĂƥƉ ƝǆǤǰƧƲ ƗƪƧǤǆǆƲ ǇǌǆǤǒƥ ǢǤǰƛƉ ƘǤƲ!ǤƱ!ƒ (4-3) ýǂT



(Adobe Illustrator) ƨǩǒƨƙƪǒ!ƒ ǑƜĂƥ ƝdžǨǰƨƜ ƗƪƨǻdždžƜ LJnjdžǨǒp ǨǨǰǽ ƘǴƜ!ǴƱ!ƒ (5-3) ý‡T



(Adobe Illustrator) ƨǩǒƨƙƪǒ!ƒ ǑƜĂƥ ƝdžǨǰƨƜ ƗƪƨǻdždžƜ LJnjdžǨǒp ǨǨǰǽ ƘǴƜ!ǴƱ!ƒ (6-3) ý‡T

(4) !ҕϸ ҕѲǂǄ

Ƨ Ǌϸǭǁ ƛǝƑƚǆ

ϸƚĭϸƚƨĭǁ Ĭ ǴǊǭǨ ƛǄƑǆϸǴ !ƐǭƢƚƨƑǴ !ƨϸǁ üǘƢ ǄǆǄ ƔƤƻǆǄǁ ƖƑǴǁƑƯǁ üƑǄƳǓ ƚƤƑǄǆ

(Adobe Illustrator)

108-105	ǭǊϸǊǁ üǄƴƖ Ĭ ǆǊǂǁ ƚϸǭƚǁƐǊ ƕƯĭƨǴǁ ƕĭƨǭǆǊǁ üƑ ǀ Ɩ ǓƐ !ƐǭƢƚƨƐ ƖƑĭϸǉƦǁƐǊ
114-109	ƕĭƨǭǆǊǁ üƑ ǀ Ɩ ǗƐ !ƐǭƢƚƨƐ üǘƢ ǄǆǄ ƖƐϸƑƯƐǊ ƸϸƑƢƦ !ĭǄƬƚ ƕƯĭƨǴǁ
119-115	(Pen Tool) ĬƺƐϸƚѲǕƐ !ƨϸǁ ƔƐǭǨ !ƐǭƢƚƨƑǴ !ƨϸǁ
121-120	(Pencil Tool) ϸѲǁ !ƨϸǁ ƔƐǭǨ !ƐǭƢƚƨƑǴ !ƨϸǁ



ƘǴŏƧǋƨ!ƒĂ ƥĂƧĂ!ƒ ýdžƶ! ŎǉĂǲ!ƒ ƜƧƥƙ!ƒĂ ƗƱŏƪǈ!ƒ ƗŏƪƥLjnj!ƒ ýǴǂTŰƒ ǅƒƥƤƙƪƒ (1-4) ýǂT



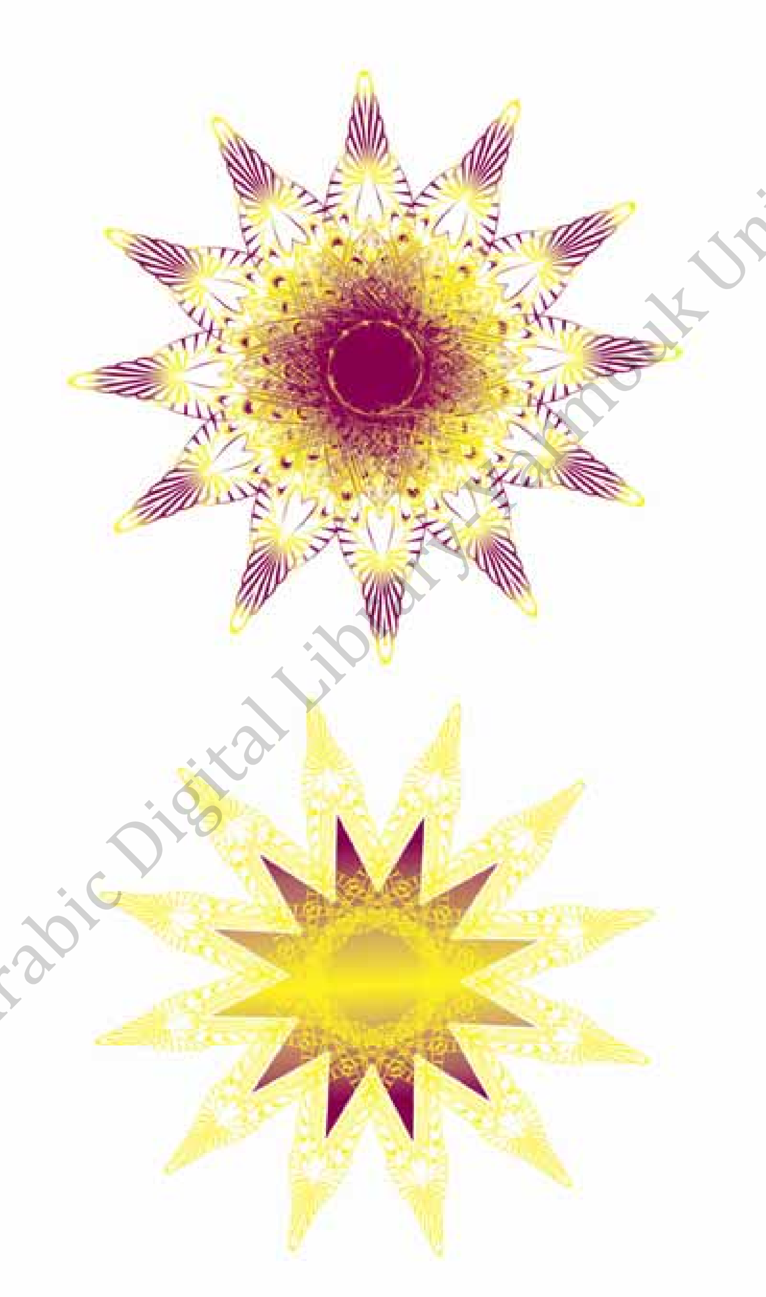
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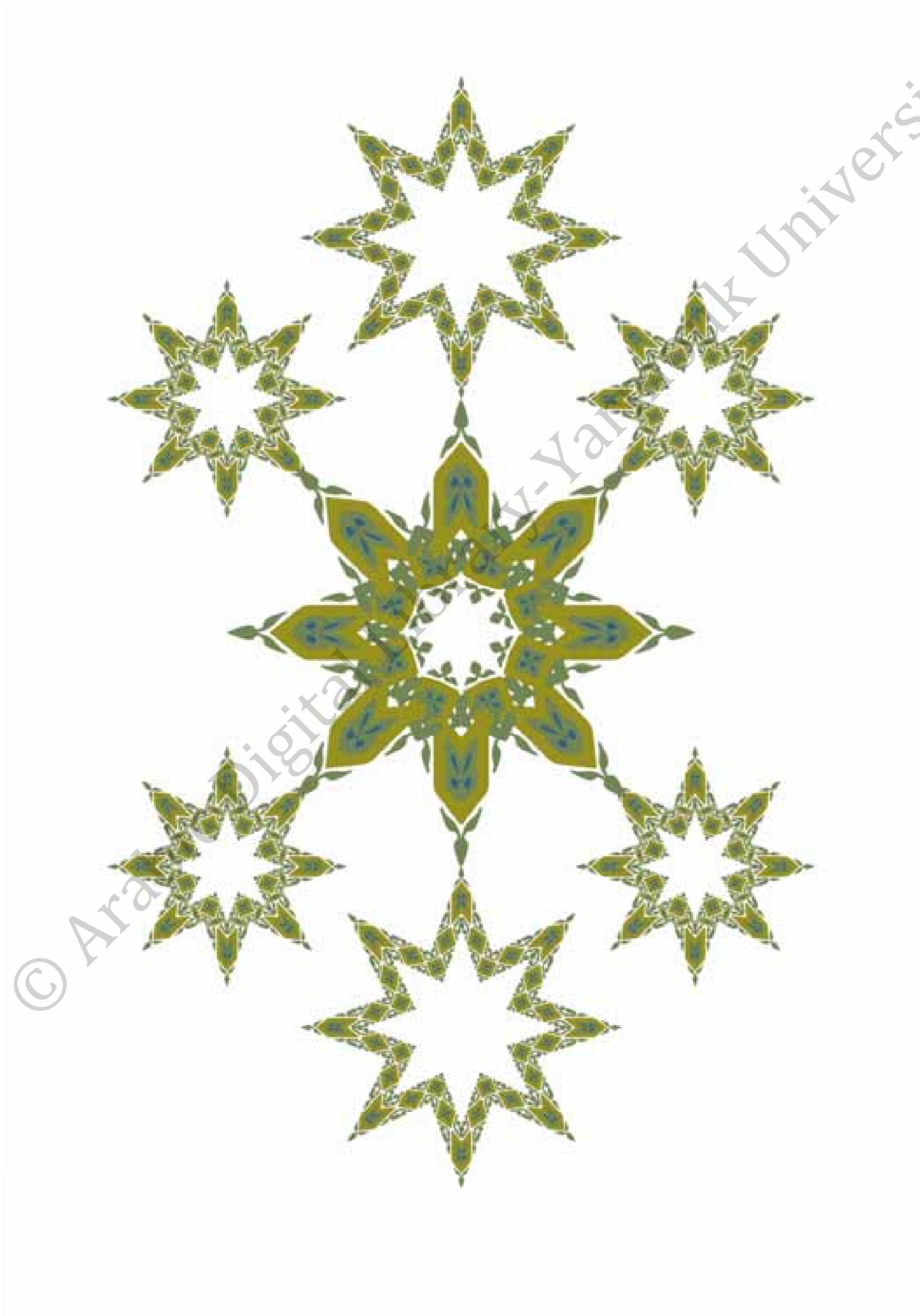
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ƘǴŏƧǌƨ!ƒĂ þĂƧĂ!ƒ ýďž! ŎǉĂǃ!ƒ ƜƧþķ!ƒĂ ƗƱŏƪǃ!ƒ Ɨŏƪþǉǌ!ƒ ýǴǂTǕƒ ǅƒþƤķƪƒ (4-4) ýǂT



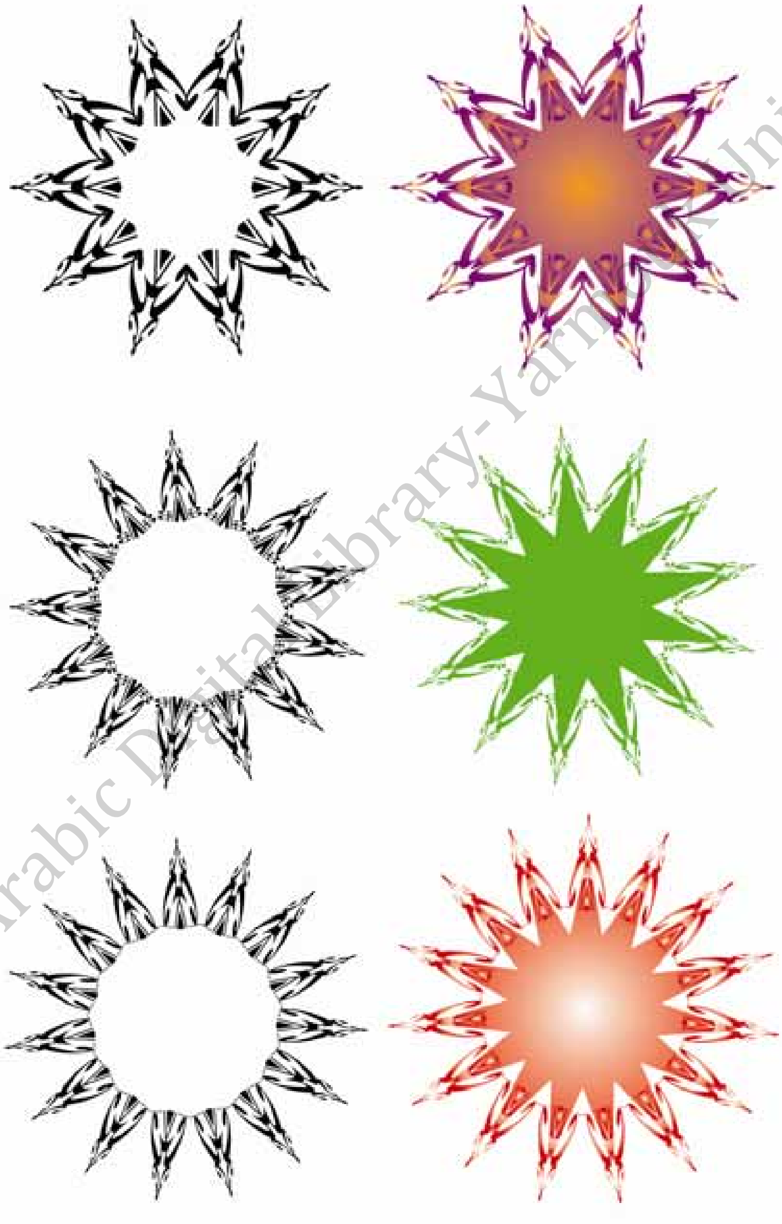
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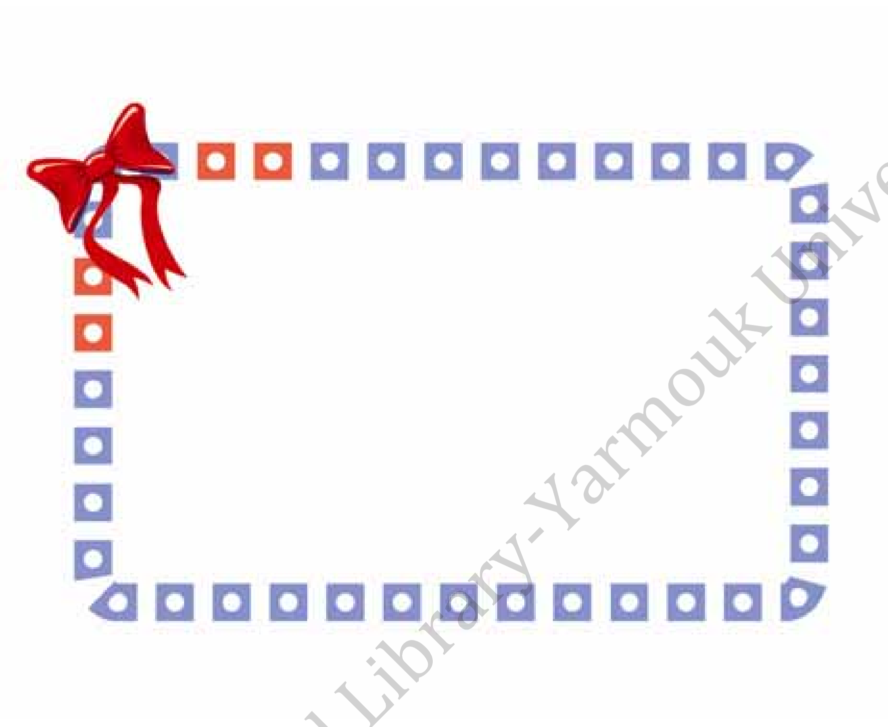
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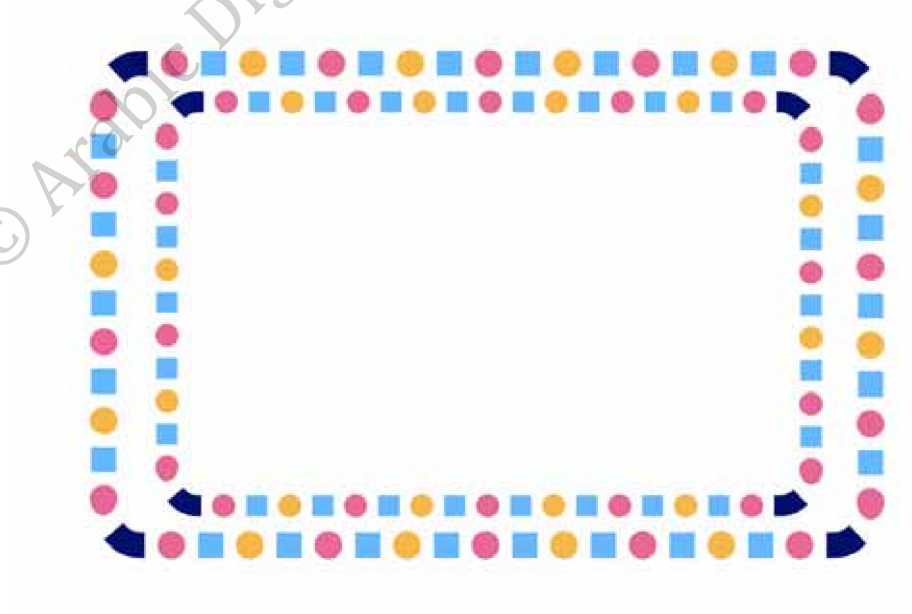
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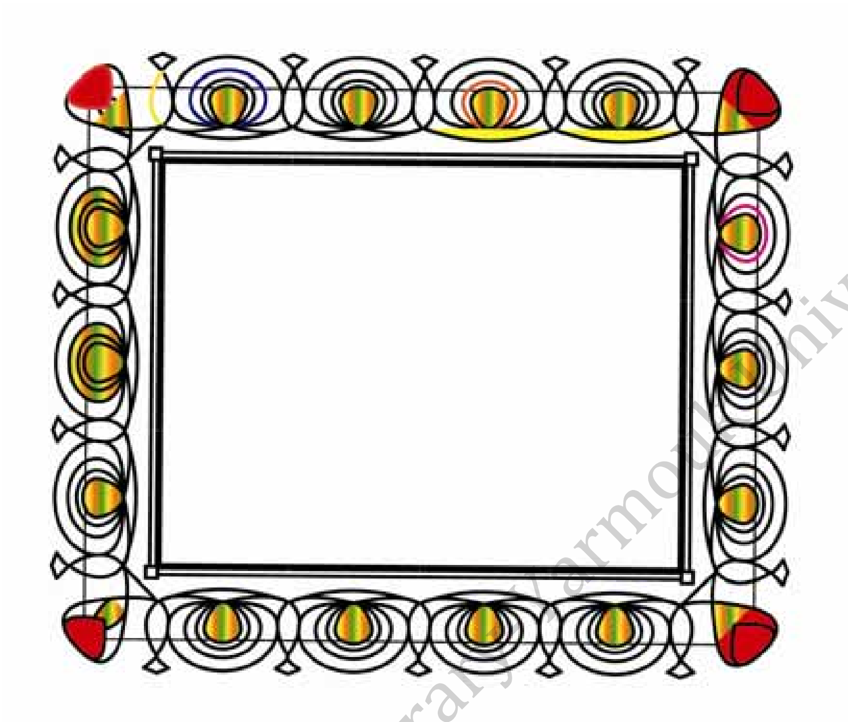
Ɨŏʅƥǁǌ!ƒ ýƠǂTǕƒ ǄƒƥƤƘʅƒ ýǚƤ Ǉǆ ƻƧƠƤƨ Ǆŏǆʈƙ (8-4) ýǂT



Ŧŏʅƥǖnj!ƒ ýǴŧTŰƒ ǅƒƥƤƙʅƒ ýǚƤ ǇǍǆ ƘƒƧǴƱƒ ǅŏǆƮƙ (9-4) ýŧT



Ŧŏʅƥǖnj!ƒ ýǴŧTŰƒ ǅƒƥƤƙʅƒ ýǚƤ ǇǍǆ ƘƒƧǴƱƒ ǅŏǆƮƙ (10-4) ýŧT



Ŧŏʅƥǀnj!ƒ ýǴŧTŰƒ ǄƒƥƤƙʅƒ ýǔP ǇǅǆǇ ƘƒƧǴƱƒ ǄŏǆǇ Ƭƙ (11-4) ýŧT



Ŧŏʅƥǀnj!ƒ ýǴŧTŰƒ ǄƒƥƤƙʅƒ ýǔP ǇǅǆǇ ƘƒƧǴƱƒ ǄŏǆǇ Ƭƙ (12-4) ýŧT



(Pen Tool) Ŏ5ƒƧƙơŬƒ ĎĭƮƧ!ƒ ƖƒƥĐ ĎĭƒƥƤƙƮƓ ýƬŰƒ ƖƧĂƬ!ƒ ĎĭƮƧ (Đ-13-4) ý‡T



ýƬŰƒ ƖƧĂƬ!ƒ (Ɣ-13-4) ý‡T



(Pen Tool) Ŏ5ƒƧƘơǕƒ ǅƪƧ!ƒ ƖƒƥǅǅƒƥƤƘƪǄ ýƮǕƒ ƖƧĂƮ!ƒ ǅƪƧ (-14-4) ý‡T



ýƮǕƒ ƖƧĂƮ!ƒ (Ɣ-14-4) ý‡T



(Pen Tool) Ŏ5ƒƧƙơǛƒ ǇĭƪƧ!ƒ ƖƒƥǇ ǇƒƥƤƙƪǤ ýƬǕ̄ƒ ƖƧĂƬ!ƒ ǇĭƪƧ (Ǉ-15-4) ýǂT



ýƬǕ̄ƒ ƖƧĂƬ!ƒ (Ɣ-15-4) ýǂT



(Pen Tool) ŎƼƒƧƙơŬƒ ƔƮƧ!ƒ ƖƒƥƊ ƔƒƥƤƙƮƓ ýƬŬƒ ƖƧĂƬ!ƒ ƔƮƧ (Ɗ-16-4) ýǂT



ýƬŬƒ ƖƧĂƬ!ƒ (Ɣ-16-4) ýǂT



(Pen Tool) Ŏ5ƒƧƙơŬƒ ǅƪƧ!ƒ ƖƒƥƉ ǅƒƥƤƙƪǄ ýƬŰƒ ƖƧĂƬ!ƒ ǅƪƧ (Ɖ-17-4) ýǂT



ýƬŰƒ ƖƧĂƬ!ƒ (Ɣ-17-4) ýǂT



(Pencil Tool) Ƨơǃƒ ȞƪƧǃƒ ƖƒƥȠ ȞƒƥƤƙƪǄ Ƨơ ȞƪƧ (18-4) ýǂT



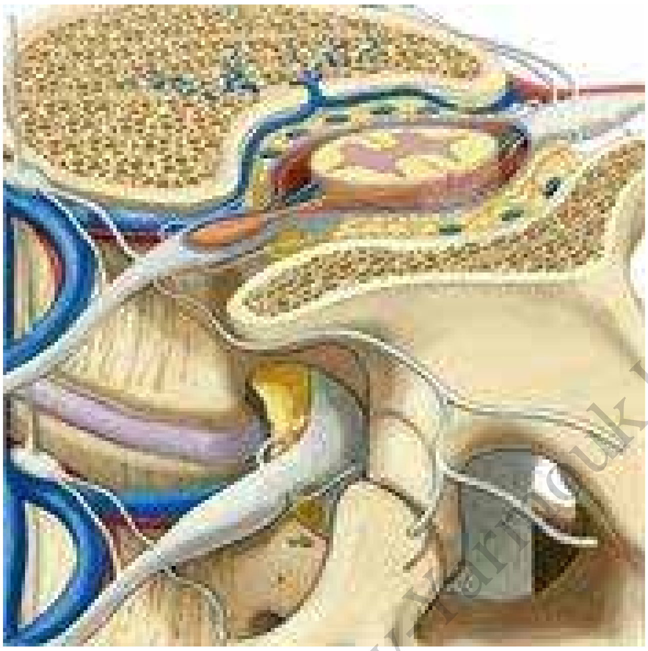
(Pencil Tool) ƧơǃƒǄĩƪƧǃƒ ƪƒƥǄ ǄĩƒƥƤƙƪǤ ƧơǄĩƪƧ (18-4) ýǂT

(5) !ҕϸ ƼѲǂǅ

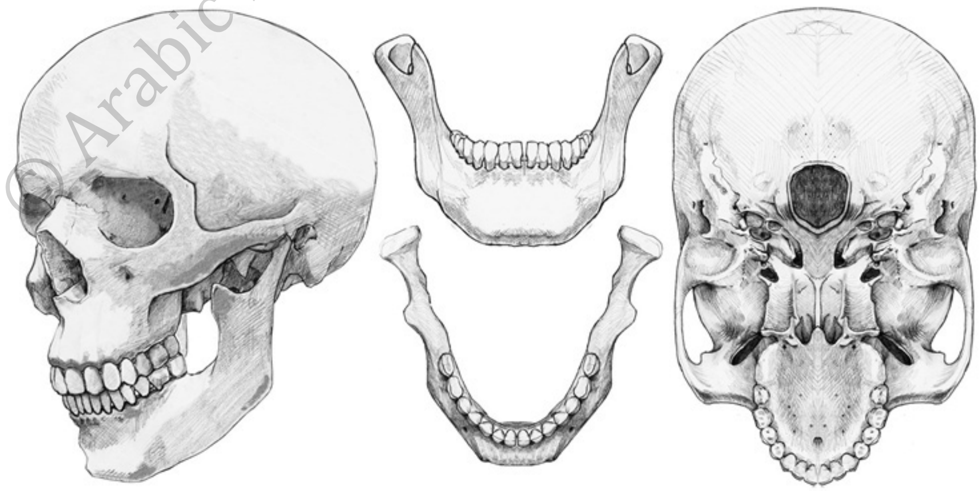
ƨƙŏƨƙƪŏ!ƒ ǑƕǍϸǅ ǋdžǤǰƨƕ ǅǌǰdžƒϸƤƙƪƒ ýűƤ Ǉdž ǇǑǰǤǰҕ!ƒ ýǤdžƵȖ ɯƦǤdžǈǰ

ǅǌǰǍ (Adobe Illustrator)

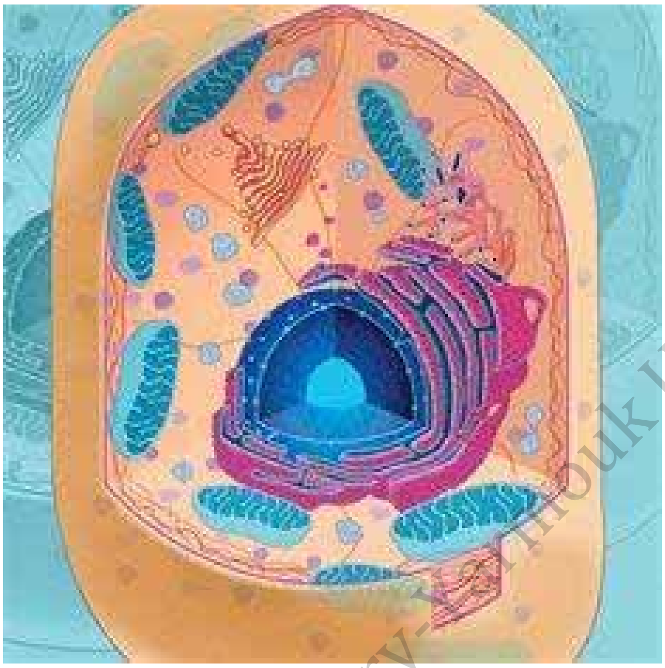
124-123	Joel C. Boyer
126-125	Koichi Fugi
128-127	Jessine Hein
130-129	Richard Ohipps



ÜLJĂĿǰǁ! ȽǒǆǉĜƶ!ƒ Ƚ!ǴǂĂ!ƒ Ŏ5 ƘƣƧƵ ÜŎǂĂT!ƒ YǴPĿǰǁ! ƠǒƧTƙ Ü(Joel C Boyer) ƧǒĂƕ Ŏʅ ýǒĂƞ
.ƒþĿǂ ÜǄ2012



.ƒþĿǂ ÜǄ2013 ÜȽǒƧTƕ!ƒ ȽǆƞǆƞǄ! ƠǒƧTƙ Ü(Joel C Boyer) ƧǒĂƕ Ŏʅ ýǒĂƞ



.ƒþǀǂ ÜƜ2014 ÜŧŏǀǴƪǀŰƒ ŧŏǐƤ!ƒ ƠŏƨƬƙ Ü(Joel C Boyer) ƨŏĀƀ Ŏƪ ýŏĂƞ



.ƒþǀǂ ÜƜ2011 ÜŎǀǴƪǀŰƒ ŎƀƮƺ!ƒ ƨǴǌƞ!ƒ Ü(Joel C Boyer) ƨŏĂƀ Ŏƪ ýŏĂƞ

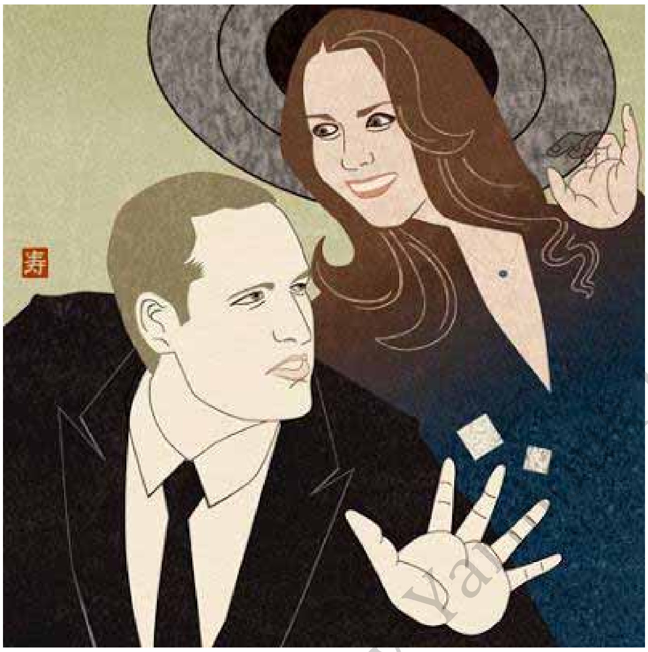


ÜǈǤǆǆǂ!ƒ ǑǃƨǤƵ ƧǌTǅ Ü(Nigel Kennedy) ǐþǒǉǒǂ ýɳǒǤǉ! ǅʅƧ Ü(Koichi Fugi) ǑɳǍƼ ǑTƙǍǂ

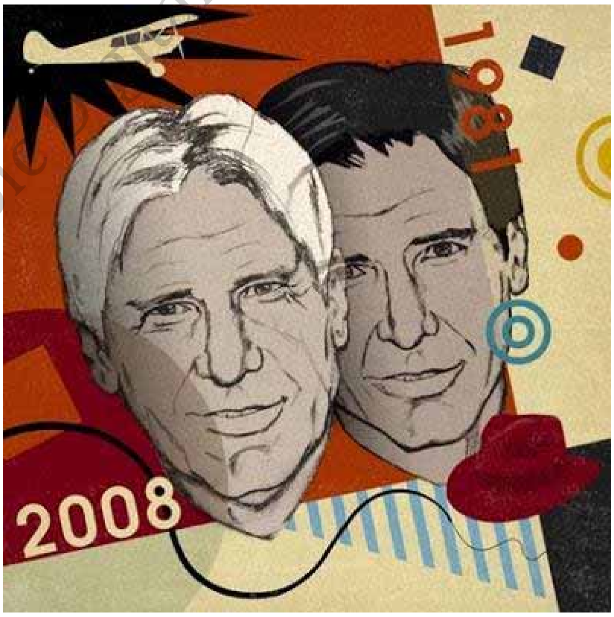
.ǇþǇ! ÜǄž2013



.ǇþǇ! ÜǄž2011 Ü(Annie Lennox) Σǂ ǍǇǒ! ǑǇƈ Ü(Koichi Fugi) ǑɳǍƼ ǑTƙǍǂ



(Prince William and Kate ǇǍƙ!ƥǒǆž ǑƙǴǂǍ ǅǴǒ!Ǎ ƧǒǆžǕƒ Ü(Koichi Fugi) ǑƞǍ5 ǑTƙǍǂ
.ǇƥǉǃÜǅž2011 ÜMiddleton)

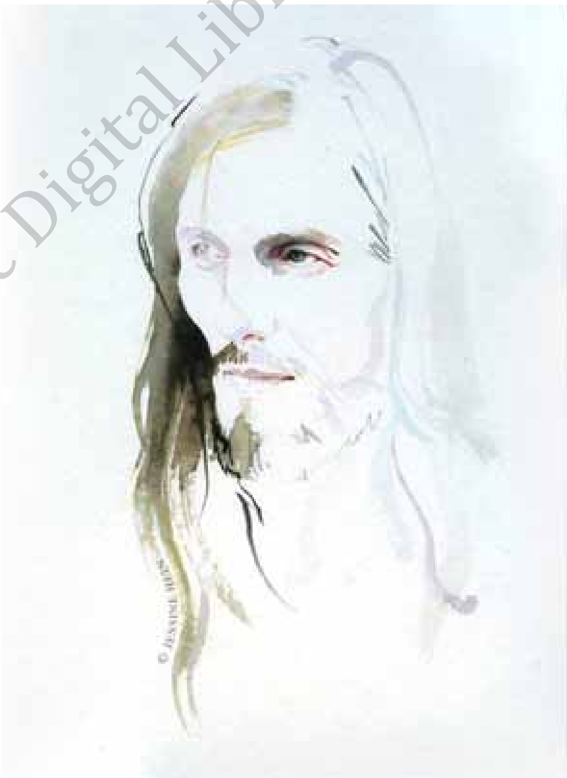


.ǇƥǉǃÜǅž2008 Ü(Harrison Ford) ƥƧǍ5 ǇǍʅǒƧǴǋ Ü(Koichi Fugi) ǑƞǍ5 ǑTƙǍǂ



Ü2014 Ü"NJĭŏ Ƭ Ǵ϶k Ĭ!ǫ ƧƱǇk ǴdžƥǇƵ ǷdžǴdžk Ƨ ǶkƤdž Ăƥŀŏ ƐŏƬ ý‡" Ü(Jessine Hein) ǇĴŏǋ ǇĴʅŏƞ

.ǴŏǇǴdž!ƒ



.ǴŏǇǴdž!ƒ Ü2014 ÜƠŏʅdž!ƒ ƥŏʅ!ƒ Ü(Jessine Hein) ǇĴŏǋ ǇĴʅŏƞ

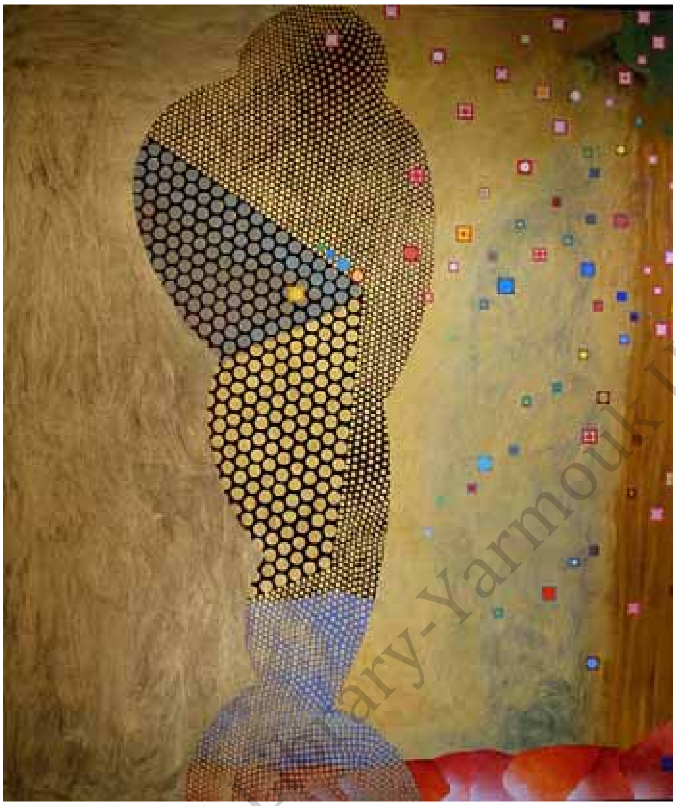


ƇǴǀǜǛ! ẓƧƱ ưǆ ƘǉǂƒƦǫ ǇƠǂǆ ǐ Ɗ Ǐ!ǫ ǁƦƤǂk ǇƒyǒƱkʅk lƧǂƺ!ƒ" Ü(Jessine Hein) ǇǒǊ Ǉʅǒƞ

.ƓǒǉƓǆ!ƒ Ü2013 Ü" ǁǉƓǂǆ Ŏƽ



.ƓǒǉƓǆ!ƒ Ü2013 Üƨ!ƧƓTk ǐǍƧ ǂpƧƺ! ǂǒǉƐŰ ǂǆƞƧk Ü(Jessine Hein) ǇǒǊ Ǉʅǒƞ



.ǈƥǉ! ÜƉ2013 Ü"ǈǤǆÜƒ" Ü(Richard Ohipps) ΣƕǒǊĂƒ ƥƧǴTƙǒƧ



.ǈƥǉ! ÜƉ2009 ÜƗǒĂnj!ƒ ƖƧĂƱƪƉ Ü(Richard Ohipps) ΣƕǒǊĂƒ ƥƧǴTƙǒƧ



.ǇþǉǃǃÜĎž2013 Ü"þƶħ ǑƘďǒ˥ ƒƦĜdž" Ü(Richard Ohipps) Σ ħǒNjĂƒ þƧĜTƘǒƧ



.ǇþǉǃǃÜĎž2012 ÜȿƧƨŰƒ ČĂ ư!ƒ" Ü(Richard Ohipps) Σ ħǒNjĂƒ þƧĜTƘǒƧ

Abstract

Hindi, Shadia Yousef. Adobe Illustrator as a Proposal to Develop the Artistic Skills to the Primary 10th grade Students in Jordan, MA Thesis Yarmouk Univresity, Irbid (2014). (Supesrvisor: Dr. Monther Sameh Al Atoum).

This study aims to suggest Adobe Illustrator as an educational platform to be tough in the curriculum of the Arts subject for the 10th grade students, as an application within the computerized arts education while reaching the extent of the abilities of this software. This application will indeed assist in developing the artistic creativity of the 10th grade students due to its flexibility and variety of tools in the implementation of arts. Presenting the multi-usage provided by this software.

Therefore, to present the study aims as so as answering the questions that might occur. The researcher used this experimental curriculum group in a suggested sample group of 10th grade students from the students of (Jumana Bent Abi-Talb) school in the district of Ramtha – Jordan, during the first semester (2014 – 2015). The sample consisted of 26 students demanded by the researcher assuring tribal and tele-metric artistic executions through observation tool. The researcher created an evaluation list to keep tracking the students' performance for the usage of the computer, also another list for the usage of the Adobe Illustrator application. Also a curriculum has been held for the students during an 8 weeks period and a 28 educational hours approximately, and the tracking of the student's performance for both lists and the results came out with an obvious statistical refinement of the student's artistic performance. The study came

out recommending this software to be tought in the arts and computer learning curriculums for the 10^{th} grade, also the importance of the educational workshops for the arts teachers to learn the Adobe Illustrator software and its implications so for it to be considered for the elementary levels for the students.